

UNESCO-NIER REGIONAL PROGRAMME

Joint Study on Some Major Developments  
in Elementary School Curriculum in  
Asian and Pacific Countries

— Research Design —

Report of a Regional Workshop

28 February to 15 March 1984

Section for Educational Co-operation in Asia  
National Institute for Educational Research (NIER)  
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## INTRODUCTION

### *Background*

The National Institute for Educational Research (NIER) of Japan organized a series of workshops in the late 1960's to undertake a joint research project on "A Comparative Study of Curriculum Development at the Stage of Elementary Education in Asian Countries". The major purposes of the joint research project were "to understand the curriculum systems of Asian countries, appreciate the similarities and differences among them in the context of their socio-economic and cultural backgrounds, identify general trends as well as unique features of their procedures of curriculum development, locate common as well as special problems in this field, and exchange experiences with one another for mutual benefit". The project was also directed to obtain benchmark data in respect of curriculum development in Asian countries for future use. This project was carried out by NIER in collaboration with Unesco, Bangkok as a part of the Unesco-NIER Regional Programme for Educational Research in Asia, and thirteen countries in Asia participated in the project. The report entitled "Asian Study on Curriculum" was published in 1970 by NIER in three volumes.

More than a decade has passed since the above project was implemented and many countries in the region have revised or are currently revising their curricula, so NIER decided to initiate a new research project on a similar topic in order to compile updated information in respect of elementary school curriculum in the region. The outcome of the project of workshop is expected to contribute toward the realization of universalization of primary education (UPE) in the region which is one of the focal points of the activities of the Asian Programme of Educational Innovation for Development (APEID).

For the purpose of formulating a research design of the project, NIER organized a Regional Workshop on the Study of Elementary Curriculum in Asia and the Pacific from 28 February to 15 March 1984 in collaboration with ACEID, Unesco Regional office, Bangkok, within the framework of APEID.

### *Objectives of the Workshop*

The objectives of the Workshop were:

- 1) To review the curriculum development work undertaken by the participating countries in the region for the past ten years;
- 2) To identify major trends in respect of curriculum development in the region; and
- 3) To develop a research design for the joint study of elementary curriculum in the region.

## *Participation*

The Workshop was attended by twenty-one participants from fifteen countries. Unesco was represented by Dr. Prem K. Kasaju, Specialist in Developmental Research in Education, ACEID, Unesco Regional Office in Bangkok. In addition, four observers also attended the Workshop. A List of all participants and NIER secretariat is included in Appendix I

## *Officers of the Workshop*

The participants elected the following officers of the Workshop:

Chairperson:	Dr. Kamol Sudaprasert (Thailand)
Vice-chairpersons:	Dr. Gurbaksh Lal Arora (India) Mr. John K. Millar (New Zealand)
Rapporteurs:	Dr. Marcelina M. Miguel (Philippines) Ms. Tan Teng Wah (Singapore)
Group Rapporteurs:	Ms. Han Ah Yew (Singapore) Dr. Siriporn Boonyananta (Thailand)

## *Organization of the Workshop*

The Workshop was inaugurated by Dr. Hiroshi Kida, Director General, National Institute for Educational Research (NIER) of Japan. Dr. P.K. Kasaju, Unesco staff member and Mr. Kusaba, Director of the Educational and Cultural Exchange Division, Ministry of Education, Science and Culture (Mombusho) in Japan welcomed participants on behalf of Unesco and Mombusho respectively.

The workshop conducted its deliberations in plenary and group sessions. In the first few plenary sessions, individual papers presented by participants were discussed. Individual papers are included as Appendix II.

In the following sessions, the workshop synthesized experiences of participating countries and analyzed major trends in respect of elementary curriculum development in the region. The workshop also developed a research design for a joint study of elementary curriculum in the region.

## *The Report*

A draft report was presented at the concluding session of the workshop and was adopted with some modifications. The suggested modifications and corrections have been incorporated in this final report.

This report is published to provide a basic framework for undertaking a study of elementary curriculum in the countries in the region of Asia and the Pacific. It is hoped that all the countries in Asia and the Pacific will undertake a study within the scope and framework described in this report, and also participate in the workshop which is planned to be organized by NIER in early 1985 for the comparative analysis of the outcomes of the study conducted in each country.

Note: Terms like ELEMENTARY and PRIMARY are used interchangeably in this report as well as in this project.

## Section I

### SYNTHESIS OF MAJOR TRENDS AND COMMON CONCERNS RELATED TO THE CURRICULUM IN ELEMENTARY SCHOOLS

After the presentation of the individual reports on major trends in curriculum development at the level of elementary education, a plenary session was held to identify and synthesize trends which were common across all or a majority of the participating countries. In so doing, certain unique features of the curriculum in each country were identified and also a range of common concerns.

Because of the range of material being considered and given the need to propose a study of reasonably manageable proportions, it was decided to prepare a topic framework which would embrace most if not all of the material under consideration as succinct as possible. The topic framework is reproduced below:

#### *Topic Framework:*

#### I OBJECTIVES

National

#### II CURRICULUM DEVELOPMENT & INSTRUCTION

##### A. Major Concerns

1. Integration of Subjects
2. Relevancy of Curriculum
3. Curriculum Load
4. Emphasis on Basics

##### B. Subject Areas

Languages, Mathematics, Science, Social Studies,  
Art & Music, Health Education, Physical Education,  
Others

##### C. Other Curriculum Areas

1. Emphasis on Moral Education
2. Emphasis on Work Orientation

##### D. Instructional Approach/Strategy/Method/Programming

##### E. Development of Curriculum Materials



### III SUPPORTING STRUCTURES/AGENCIES

- A. Institutionalization of Curriculum Development, Distribution of textbooks, etc.
- B. Teacher Preparation
- C. Others

### IV EVALUATION

### V RESEARCH ACTIVITIES

### VI OTHERS

For each topic, as appropriate, participants were invited to record major trends and any apparent concerns (and other comments) they considered necessary. Thus, summaries of the individual reports specifying major trends and concerns in terms of a single, unifying topic framework were compiled. These summaries are reproduced below:

TOPIC	COUNTRY	AUSTRALIA	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Objectives of primary education scrutinized regularly but interpretation subject to debate	Varies from state to state. Parent/community involvement; mainstreaming of less able children & technology & its impact may soon cause change
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u>	Learning programmes for the early years tend to be integrated. Literacy & numeracy remain separate	Should subject syllabuses be abandoned in favour of integrated programme/curriculum guides?
	A. Major Concerns		
	1. Integration of Subjects		
	2. Relevancy of Curriculum		
	3. Curriculum Load	Wide variety of curriculum policy statements have impact on scope of curriculum	How to best incorporate priorities in the objectives and programmes without over-burdening the curriculum?
	4. Emphasis on Basics	Continuing emphasis on the basics especially literacy and numeracy	
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	Traditional subjects continue to be the basis of the overall curriculum framework	Additional "thematic study areas" are often included
	C. Other Curriculum Areas	Religious education is a part of the curriculum	In addition, education in the values of the society permeates the total curriculum
	1. Emphasis on Moral Education		
	2. Emphasis on Work Orientation		
	D. Instructional Approach/Strategy/Method/Programming	Wide variations but essentially focus is on the child as an individual	Relationship with state syllabuses & curriculum guides a matter for debate  Do they cater to all groups of children?
	E. Development of Curriculum Materials	Learning materials chosen from range available commercially	Commercial materials may not be congruent with state syllabus;  Are these learning materials adequate?
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u>		
	A. Institutionalization of Curriculum Development Distribution of Text-books etc.		
	B. Teacher Preparation		
	C. Others		
IV	<u>EVALUATION</u>	Assessment of children continues to be important to both teachers & parents	How can teachers be provided with an adequate range of assessment materials which reflect objectives of primary education & yet take into account wide variation of learning programmes & material
V	<u>RESEARCH ACTIVITIES</u>		
VI	<u>OTHERS</u>	School-based curriculum dev.  Continuity in curriculum dev.	Overloading teacher work load

TOPIC	COUNTRY	BANGLADESH	
		Trends	Comments/Problems
I <u>OBJECTIVES</u> National		Universalization of primary education programmes; Improvement of the quality of primary education with a view to producing efficient manpower needed for the socio-economic development of the country	Curriculum not supportive of universalization objective
II <u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns		History, Geography & Civics to be integrated as Environmental Studies	Difficulty in developing materials along lines of integration
1. Integration of Subjects			
2. Relevancy of Curriculum		Curriculum to relate to actual life situation	Inability of teacher to teach using actual situation due to lack of physical facilities in the school
3. Curriculum Load		Concern expressed in some quarters about curriculum load	Study on curriculum load is under-way
4. Emphasis on Basics		Weightage on Bengali and Maths	In the school timetable Bengali and Maths occupy prominent place
B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others		English to be a compulsory subject from Grade 3; the pupils have to acquire basic skills in language and maths, and to be acquainted with the social and physical environment in which they live	In most cases, the teacher uses traditional methods in teaching English as a foreign language
C. Other Curriculum Areas		Emphasis on religious education	Teachers lack adequate training in teaching the subject
1. Emphasis on Moral Education			
2. Emphasis on Work Orientation		Growing emphases on relating education to productive work particularly in schools being developed or Community Learning Centers	The teachers need to be motivated for the success of the programme
D. Instructional Approach/Strategy/Method/Programming		Increased emphasis on activity method	Lack of physical facilities in the school
E. Development of Curriculum Materials		Provision of readiness materials in language & maths for pupils entering Grade 1	Additional expense for materials and teacher training to use them
III <u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of textbooks etc. B. Teacher Preparation C. Other		Distribution of free textbooks; Establishment of National Curriculum Development Centre; Amalgamation of NCDC & Textbook Board; Supply of teachers guides & pupil workbooks; Orientation of teachers on new curriculum	Delay in distribution; NCDC not involved in textbook production; Lack of funds to develop materials; Teachers lack interest in improving teaching practices
IV <u>EVALUATION</u>		Growing realization of the importance of continuous pupil evaluation	Lack of adequate training on the part of teachers in continuous evaluation system
V <u>RESEARCH ACTIVITIES</u>		Research activities on children's readiness in Bengali & Maths while coming for admission in Grade I. Identification of Instructional objectives; Development of Minimum Learning Continuum	Completed  Continuing Continuing
VI <u>OTHERS</u>		Pre-testing of revised versions of 14 textbooks on different subjects	Nearly completion

TOPIC	COUNTRY	CHINA	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Stress on pupils' all-round development: morally, intellectually, physically and aesthetically	Overloaded homework and assessment problem under research for further study
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects	Integration of classroom teaching and extra-curricular activities to make study more lively and vigorous	
	2. Relevancy of Curriculum	Curriculum to foster skills like studying independently; Provide special education for retarded children to enable them to become useful citizens; Provide for both unification and diversity in curriculum	
	3. Curriculum Load	Protect children from overloaded homework by upgrading teaching and innovating assessment system	
	4. Emphasis on Basics	Emphasis on basic subjects (Chinese and maths) in all grades	
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	Increased importance attached to popular/modern science by offering to all grades; Adding computer knowledge to mathematics	
	C. Other Curriculum Areas 1. Emphasis on Moral Education	Attach importance to moral education and offer it to all grades	
	2. Emphasis on Work Orientation		
	D. Instructional Approach/Strategy/Method/Programming		
	E. Development of Curriculum Materials		
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of textbooks etc. B. Teacher preparation C. Others	Teachers' training centres of all levels - from central down to local - have been established	
IV	<u>EVALUATION</u>		
V.	<u>RESEARCH ACTIVITIES</u>		
VI	<u>OTHERS</u>		

TOPIC	COUNTRY	INDIA	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Accelerating the process of modernization, increasing productivity, promoting national integration, developing pupils 'total personality' are major objectives	
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u>		
	A. Major Concerns		
	1. Integration of Subjects	Integrating curriculum with environment of child; Science & Social Studies included under environmental studies; Integrating curriculum with work; Population education integrated with existing areas	In practice, separate books for Science & Social Studies taught as separate subjects  Increasing emphasis on population education
	2. Relevancy of Curriculum	Moving towards a competency based curriculum; Making curricular provisions aimed at increasing holding power of school;	Minimum learning continuum developed; Huge drop-out rate; Provisions for providing instruction through dialect for tribal children
	3. Curriculum Load	Concern voiced regarding curriculum load	Study on curriculum load is underway
	4. Emphasis on Basics		In practice, 'basics' are emphasized
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	To teach only mother tongue up to Grade 5; Increasing emphasis on Science and Mathematics; Increasing importance of art education; Increasing importance of Health & Physical Education	Provision to teach 2 additional languages at middle and secondary stages; Considered essential for modernisation; Yogic exercises included
	C. Other Curriculum Areas		
	1. Emphasis on Moral Education	Towards development of a value-based curriculum	Secular country; Religious education not allowed; Moral education integrated in existing subjects
	2. Emphasis on Work Orientation	Provision for a compulsory area of curriculum known as 'socially useful productive work'	Internal assessment; Lack of facilities; Not considered important by students
	D. Instructional Approach/Strategy/Method/Programming	Interactive teaching strategies & new instructional techniques; Increasing importance on co-curricular activities aimed at balanced development of child's personality	Few teachers use them in actual classroom situations; Movement of community singing aimed at promoting national integration
	E. Development of Curriculum Materials	Towards nationalization of textbooks; Realization of the importance of supportive materials Bureau for the preparation & distribution of textbooks	Earlier only textbooks were
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u>		
	A. Institutionalization of Curriculum Development-Distribution of textbooks etc.	NCERT at the national level and SCERTs at the state level; Massive programme of in-service education of teachers	
	B. Teacher Preparation		
	C. Others		
IV	<u>EVALUATION</u>	Towards continuous pupil evaluation; Periodical evaluation of curriculum	Not to pass judgement; Diagnostic in nature; No detention at lower grades
V	<u>RESEARCH ACTIVITIES</u>	Improving the process of curriculum development through situational analysis	Situational analysis is carried out by undertaking environmental surveys
VI	<u>OTHERS</u>		

TOPIC	COUNTRY	JAPAN	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National		
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects 2. Relevancy of Curriculum 3. Curriculum Load 4. Emphasis on Basics B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others C. Other Curriculum Areas 1. Emphasis on Moral Education 2. Emphasis on Work Orientation D. Instructional Approach/ Strategy/Method/ Programming E. Development of Curriculum Materials	Integrated approach of the subjects centering on Social Studies or Science is recommended especially at the lower grades National courses of study made less restrictive and less detailed to promote teachers initiative & creativity in instruction Decrease content of subjects for elementary level by transferring difficult topics to lower secondary schools Increase lesson hours of Japanese and Maths for Grades 1 & 2 Individualised instruction; Provisions for 3 to 4 "school-free design" hours in Grades 3 to 6	Efficient curriculum for the integrated approach has not been developed High competitiveness among students due to the teachers' value of teaching and the pressure from the entrance examination Decrease them for Grades 4, 5 & 6
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of text-books etc. B. Teacher Preparation C. Others		
IV	<u>EVALUATION</u>	Evaluation of pupils based on behavioural objectives	
V	<u>RESEARCH ACTIVITIES</u>		
VI	<u>OTHERS</u>	Provision of international education; Attempt to reduce class size; School well equipped; Rise in teacher salary	Problem of the pupils who cannot keep with the classroom instruction is rather serious Many pupils attend private supplementary classes after school Attempt to reduce class size from 45 to 40 is not successful for the financial reason

TOPIC	COUNTRY	MALAYSIA	
		Trends	Comments/Problems
I <u>OBJECTIVES</u>  National		National integration. Education to develop common outlook; Meeting manpower requirements due to rapid industrialization; Improvement in quality of education	Common content syllabus for all types of schools National language as main medium of instruction, preservation of other languages as medium of instruction
II <u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns		Experimental & research projects on integrated approach to teaching; Integrated approach in the teaching of science, geography, history & civics - under "Man and Environment"	For qualitative improvement of education
1. Integration of Subjects		Making curriculum relevant to the needs of the child	Aimed at overall & balanced development of the child
2. Relevancy of Curriculum		New Primary School Curriculum(1983); Knowledge postponed after acquisition of basic skills; and Reduction in the number of subjects offered	Teaching knowledge through Man and Environment from grade 4 onwards, Integration of subjects
3. Curriculum Load		Emphasis on 3 basic skills of reading, writing and arithmetic in the New Primary School Curriculum	Acquisition of basic skills in medium of instruction; 75% of total time given to acquisition of 3 Rs in grades 1, 2 & 3
4. Emphasis on Basics		Introduction of commerce in mathematics & manipulative skills as a subject	To meet production of technically skilled workers
B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others		Islamic religious education compulsory for muslims, and Moral Education compulsory for non-muslims	Also to achieve objective of national integration
C. Other Curriculum Areas		Familiarising pupils with aspects of simple tools, equipment and machines	Aimed at developing pupils manipulative skills to solve problems in everyday life
1. Emphasis on Moral Education		Experimental project on special compensatory programmes for remedial teaching of pupils with learning difficulties in early years of schooling; Active involvement of pupils; Integration of several skills in one lesson; Take into account individual differences in rate of development & learning ability	For qualitative improvement of education
2. Emphasis on Work Orientation		Development of materials to suit the physical environment & differences in pupil background	For qualitative improvement of education
D. Instructional Approach/Strategy/Method/Programming		Establishment of Central Curriculum Development Centre; Textbook loan scheme; Better teaching facilities & establishment of teacher centres; Pre-school involvement of community in early education; Textbooks controlled by Ministry of Education	Towards qualitative improvement of education
E. Development of Curriculum Materials		Better facilities for research, evaluation and development; On-going pupil evaluation Constant monitoring of curriculum implementation	At Central Curriculum Development Centre; To assist learning & remedial activities; To improve curriculum development
III <u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of textbooks etc. B. Teacher Preparation C. Others		Application of recent research in curriculum & learning	Review, study and apply research studies conducted in other parts of the world
IV <u>EVALUATION</u>			
V <u>RESEARCH ACTIVITIES</u>			
VI <u>OTHERS</u>			

TOPIC	COUNTRY	NEPAL	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Universalization of primary education; Improvement in quality of education	Number of schools increased More women teachers are trained to increase population of girl pupils; Other incentives provided
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects	At Grades 1 - 3, concepts in science have been incorporated into social studies curriculum; Integrated curriculum of language, mathematics, social studies, health, science, art & craft have been drafted; Population education also integrated into subject areas	Still undergoing try-out
	2. Relevancy of Curriculum		
	3. Curriculum Load		
	4. Emphasis on Basics	Emphasis on teaching of National Language - Nepali	Going on smoothly
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	Science is taught as a separate subject from class IV	
	C. Other Curriculum Areas 1. Emphasis on Moral Education	Moral & national values have been incorporated in moral education	
	2. Emphasis on Work Orientation	Emphasis on dignity of labour	
	D. Instructional Approach/Strategy/Method/Programming		
	E. Development of Curriculum Materials		
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development-Distribution of textbooks etc. B. Teacher Preparation C. Others	Distribution of free textbooks; Improving teacher training programme; Curriculum, Textbook and Supervision Development Center set up	
IV	<u>EVALUATION</u>		
V	<u>RESEARCH ACTIVITIES</u>		
VI	<u>OTHERS</u>		



COUNTRY TOPIC	NEW ZEALAND	
	Trends	Comments/Problems
I <u>OBJECTIVES</u> National	National objectives being considered	
II <u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects 2. Relevancy of Curriculum 3. Curriculum Load 4. Emphasis on Basis	Integrated programmes in elementary schools	School-based integration of state syllabus into integrated programmes
B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	Developments in all subjects	Increasing effort to support Maori language; Problem of teachers not being able to speak Maori if demand increases
C. Other Curriculum Areas 1. Emphasis on Moral Education 2. Emphasis on Work Orientation		
D. Instructional Approach/Strategy/Method/Programming	Child-centred learning	Holistic approach but syllabus expressed in broad terms under traditional headings
E. Development of Curriculum Materials	Locally produced materials of high quality especially in reading	
III <u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development-Distribution of textbooks etc. B. Teacher Preparation C. Others	Curriculum development by Curriculum Development Division of Education; Community interest in aims of education	Ensuring that interest of all sections of community are catered for
IV <u>EVALUATION</u>	Use of Progressive Achievement Tests produced by NZCER	Schools purchase tests from NZCER. Use is not compulsory
V <u>RESEARCH ACTIVITIES</u>	Research on writing	IEA study of composition; NZCER study of composition
VI <u>OTHERS</u>	Falling school rolls; Increasing cost of education	Problem of maintaining teacher employment; Problem of funding teacher education

TOPIC	COUNTRY	PAKISTAN	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Islamization of education; National identity & integrity; Development of character; Providing more meaningful and purposeful science education; Development of individuals as citizen of world society; Opening of Mosque primary schools in rural areas	Primary education given special priority which aids universalization of primary education; High rate of illiteracy - aim literacy rate of 75% by 1988; Problem of drop-out; Lack of educational facilities for school education in rural areas; Free education for primary schools, Enrolment of girls has significantly increased
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u>	Integrated courses - "Social Studies", science; Integrated curriculum for Grades 1 to 3	Concepts kept intact
	A. Major Concerns		
	1. Integration of Subjects		
	2. Relevancy of Curriculum	Curriculum is related to the national goals	
	3. Curriculum Load	Examination of curriculum load, especially mathematics & other basic subjects	Overloaded curricula and overloaded books
	4. Emphasis on Basics		Language, Arithmetic and religious education are being emphasized
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	Music is not taught as a subject	
	C. Other Curriculum Areas	Moral Education is incorporated in Religious Education	
	1. Emphasis on Moral Education		
	2. Emphasis on Work Orientation		
	D. Instructional Approach/Strategy/Method/Programming	Concept-oriented; Activity-oriented; Emphasis on "learning by doing"	Teaching kit provided to all primary schools; Teachers trained in use of kit; Mother tongue is the medium of instruction; English is not taught in primary schools
	E. Development of Curriculum Materials	Development of textbooks at the provincial level	Guidelines and coordination by the Federal Government
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u>	Regional Education Extension Centres and Audio Visual Aid Centres provided short-term teacher training; Open University provides courses	Private sectors able to open schools and colleges since 1979
	A. Institutionalization of Curriculum Development Distribution of textbooks etc		
	B. Teacher Preparation		
	C. Others		
IV	<u>EVALUATION</u>	Constant evaluation of curricula through pupil achievement	Carried out by evaluation committees at the Federal and provincial levels
V	<u>RESEARCH ACTIVITIES</u>	Ongoing research by the Bureau of Curriculum	
VI	<u>OTHERS</u>		

COUNTRY		PAPUA NEW GUINEA	
TOPIC		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Providing an education more relevant to the needs of the child in his community and the nation	Only 60% of children attend school, Demand great, Schools, funds limited; Geographical limitations
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> 1. Integration of Subjects	Integration of prescribed subjects of English, Math. & Science with non-core subject, such as Agriculture, Health, Nutrition, Expressive Arts, Physical Education & Community Life. Community Life will become core soon	Teachers do not do this properly as they are used to teach differently, More status of prescribed subjects, Teachers must spend more time to prepare and teach integrated syllabus
	2. Relevancy of Curriculum	Relevant or useful education; Real efforts are being made to integrate and or provide better education	Decision makers, politicians, educational agencies, parents and students give more status to nationally prescribed syllabus
	3. Curriculum Load	Four subjects are core with emphasis on English followed by others	No real research have been done as to assess the curriculum load as perceived by the teachers and students
	4. Emphasis on Basics	Emphasis on reading and writing, and speaking English	Enable the majority who can't make it to high school be prepared to at least read and write
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	English is used as medium of instruction. There is a real attempt at integrating these subject areas for a more "useful" education. All these are in a trial stage	English is a second language to teachers; Supplementary materials difficult to obtain in isolated areas. Giving higher status in teaching time examination etc. to the academic prescribed official subjects than to others
	C. Other Curriculum Areas 1. Emphasis on Moral Education	Teachers following Code of Ethics Religious education; and religious school broadcasts on radio; and the society in general inculcate this	PNG is a relatively religious country where religious can be taught in school for about 80 minutes per week
	2. Emphasis on Work Orientation	Officially there should be greater teaching and emphasis to work as integrated with other subjects	Teachers, students and even parents tend to think of education as academic and related to wage employment rather than anything else
	D. Instructional Approach/Strategy/Method/Programming	Lesson programming a must for teacher in first three years of teaching. All teaching methods used; teacher and student-centered learning is encouraged, especially the latter	Problem may be that due to time and realizing the objectives of the lesson plans, teachers may resort to teacher centered and lecture-type teaching
	E. Development of Curriculum Materials	Textbooks in most of the prescribed subjects have been produced; Also support materials and guides. Distribution to schools done	All schools given a set of instructional materials, Difficulty in distribution of materials on time and in good condition; Caring for materials
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of textbooks etc. B. Teacher Preparation C. Others	In-service training of more inspectors to supervise schools to ensure nationally prescribed syllabus to be taught CDU develops and distribute curriculum materials to province which insure all schools receive their share. In-service training both at primary and tertiary level	Not enough inspectors and headmasters; Not enough enrichment & in-service courses. Financial problems stop many teachers who want to do enrichment courses. But the current inservice practice by DOE must be praised
IV	<u>EVALUATION</u>	External evaluators, statutory organizations such as ERU, and even headmasters, provincial research officers often evaluate educational projects	The research done is commendable although a lot more training and research is needed at the school level, but funds are limited
V.	<u>RESEARCH ACTIVITIES</u>	A lot done by many organization. See IV	See IV
VI.	<u>OTHERS</u>	Continual attempt to develop a more relevant curriculum with improvements and new modification. As a sample Community School Agriculture Project; Education III	More finance, sound political and/or bureaucratic decisions needed

COUNTRY		PHILIPPINES	
TOPIC		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	The New Elementary School Curriculum (NESC) states that national aims of education are in accordance with National Development Goals	Learning situations are derived from daily living in the community or society
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects 2. Relevancy of Curriculum 3. Curriculum Load 4. Emphasis on Basics B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others C. Other Curriculum Areas 1. Emphasis on Moral Education 2. Emphasis on Work Orientation D. Instructional Approach/Strategy/Method/Programming E. Development of Curriculum Materials	The new learning area, Civics and Culture in Grades 1 & 2 is an integration of civics, culture which includes music, art and physical education, health, science basic concepts To keep children in school, non-traditional measures like in-school off school modularized instruction are adopted The new curriculum of 1982 has been decongested The NESC is a "return to the basics" The Bilingual Policy dictates that both Pilipino & English must be taught from Grades 1 - 6 English is medium of instruction in learning areas of English, Mathematics & Science and the rest of the learning areas are taught in Pilipino Sense of nationhood (Filipinism) & humanism infused in all subject area Since 1972 work-orientation was infused into the curriculum NESC allows more flexibility of programming on local level; Goal-oriented instructional model for mastery learning is being emphasized in all learning areas Textbooks and teachers' manuals to be produced by PRODED are supposed to be congruent with lesson activities/practice	Teachers find difficulty in integrating content in a learning unit Self-learning kits are expensive to produce and maintain Teachers are undergoing a massive educational reorientation programme on the NESC The minimum learning competencies specially for Grades 1 & 2 are mostly on 3 R's Some teachers in non-tagalog regions find using Pilipino as a medium of instruction difficult Teachers themselves need to be re-oriented as they can teach by example and be properly motivated to teach about values Work orientation is not easy to integrate in minimum learning competencies in the new curriculum Teachers tend to ask low-level questions and allow all pupils to respond in unison Big classes handled by a teacher make individualization of learning very difficult Even with the World Bank Loan, 2 pupils will have 1 book in every learning area; still not enough
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development, Distribution of textbooks etc. B. Teacher Preparation C. Others	Massive teacher training or re-orientation for implementation of NESC Teacher education institutions are aligning their curricula to the NESC	Teachers in isolated areas spend time and money in going to Learning Action Cells (central school) Teachers in private school need to be accommodated in the Educational Reorientation Programme
IV	<u>EVALUATION</u>	Stronger emphasis on evaluation (pre-instructional, formative & summative tests)	Many teacher-made tests are not congruent with behavioral objectives
V	<u>RESEARCH ACTIVITIES</u>	A project on research and technical assistance is a component of Project PRODED	Need for evaluation of extent of use made of results of research and training programmes
VI	<u>OTHERS</u>		

COUNTRY		REPUBLIC OF KOREA	
TOPIC		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Development of whole person and national identity	Emphasis is on all-round development
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects 2. Relevancy of Curriculum 3. Curriculum Load 4. Emphasis on Basics	For Grades 1 & 2, nine subjects are integrated into three broad fields    Korean language and mathematics are emphasized throughout all Grades	Other alternative approaches in curriculum integration are sought for further elaboration   Child-centered activity is required
B	Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	Teaching English is possible at Grades 4 and above as one of extra-curricular activities	Taught as an extra-curricula activity
C.	Other Curriculum Areas 1. Emphasis on Moral Education 2. Emphasis on Work Orientation	Moral Education included as a subject matter in 1973	It is suggested that Indoctrination be avoided  A pilot project is being undertaken by KEDI for development of sound career awareness
D.	Instructional Approach/Strategy/Method/Programming	Many alternative teaching methods are applied - system instruction model, conceptual learning model, creative thinking & inquiry teaching models	More initiative and autonomy of teacher in instruction is requested
E.	Development of Curriculum Materials	Textbooks and teacher's guides are main materials	Development of learning materials beyond textbooks is required
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of textbooks etc. B. Teacher Preparation C. Others	Pre-service training of teachers extended from 2 to 4 yrs; In-service training conducted in various ways	
IV	<u>EVALUATION</u>	Changed evaluation emphasis, Evaluation of thinking process-creative thinking, problem solving; Reduce paper-pencil test & multiple choice questions	Evaluation for quality control in curriculum implementation is being undertaken at nationwide scale
V	<u>RESEARCH ACTIVITIES</u>	Institutionalization of research & Development approach in curriculum development	KEDI is the R & D centre
VI	<u>OTHERS</u>	Curriculum for computer education is being made	Installation of computer at each school is encouraged

TOPIC	COUNTRY	SINGAPORE	
		Trends	Comments/Problems
I <u>OBJECTIVES</u> National		Bilingualism in English & mother tongue; Minimization of education wastage; Production of manpower with skills for the economy; Inculcation of desired values in pupils	Increase language instruction time; Streaming from Grade 4
II <u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns		History & Geography are combined under the subject Social Studies as from Grade 4	The Social Studies project provides a complete package for instruction integrating the two subjects; Teachers not left to integrate
1. Integration of Subjects			
2. Relevancy of Curriculum		Examples used in teaching relate to pupils' experiences; More reference to local context in Social Studies	Textbooks & guides reflect this
3 Curriculum Load		New syllabuses reduce content areas in Mathematics & Science	Emphasis on concept learning rather than acquisition of facts
4 Emphasis on Basics		Emphasis on Language & Mathematics in Grades 1 & 2	Increased instruction time for languages; Science introduced only from Grade 3
B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others			
C. Other Curriculum Areas		Emphasis on Moral Education which replace Civics as a subject	Two alternative packages for moral education are prepared
1. Emphasis on Moral Education			
2. Emphasis on Work Orientation		Streaming of Grade 3 pupils into Monolingual Course with curriculum designed to enable them to receive vocational, industrial training after 8 years	Lateral transfer to academic course possible. At the end of 8 years of elementary education monolingual pupils do not sit for national exam
D. Instructional Approach/Strategy/Method/Programming		The child & activity-centered approach is stressed in the curriculum packages prepared for all subjects	Workshops are conducted in all subject areas to familiarize teachers with this approach; Use of materials produced by CDIS are monitored
E. Development of Curriculum Materials		Pupil textbooks, workbooks, teacher guides and instructional aids such as soundtapes, slides, transparencies, charts, are prepared for almost all subjects	CDIS includes development of educational technology wing; Revamping of teachers training college into Institute of Education
III <u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development-Distribution of textbooks etc. B. Teacher Preparation C. Others		Setting up of Curriculum Development Institute; Teacher education, both pre- & in-service, boosted	Teachers attend training courses and workshops on the use of these packages
IV <u>EVALUATION</u>		School-based evaluation, usually summative up to Grade 5; National exam at the end of Grade 6	Workshops have begun to teach teachers how to carry out formative evaluation; National exam ensures high standard
V <u>RESEARCH ACTIVITIES</u>		Research is undertaken by IE	Research studies relate to current issues in instruction
VI <u>OTHERS</u>		Some schools have begun to use microcomputers for teaching	Still very uncommon

TOPIC	COUNTRY	SRI LANKA	
		Trends	Comments/Problems
I <u>OBJECTIVES</u> National		Universalization of Primary Education; Minimise education wastage; Emphasis on self-learning	Parents do not want to send children to school
II <u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns		Integration of subjects in Grades 1 & 2 and partial integration in grades 3 - 5	Teachers have difficulty following integrated syllabus, Resistance of teachers to change; Concern that child may not receive enough knowledge in subject areas
1. Integration of Subjects			
2. Relevancy of Curriculum		Move from subjects & academic-oriented to life-and-society oriented curriculum	
3. Curriculum Load			
4. Emphasis on Basics		To bring forth a self-reliant educated & disciplined citizenry	
B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others		Make English compulsory from Grade 3; Introduction of science & physical education	Shortage of English language teachers; Introduce as separate subjects in Grade 3
C. Other Curriculum Areas		Imparting religious knowledge	Shortage of teachers to teach religious education
1. Emphasis on Moral Education			
2. Emphasis on Work Orientation			
D. Instructional Approach/Strategy/Method/Programming		Move from teacher to childcentred approach; Concept rather than fact learning	Lack of materials & teacher training in-service courses; Teachers still use fact-oriented approach to teaching/evaluation
E. Development of Curriculum Materials			
III <u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of text-books etc. B. Teacher Preparation C. Others		To improve teacher efficiency	Raise minimum qualification for selection; Raise the salaries of teachers;
IV <u>EVALUATION</u>		Evaluation at school level and external/state level	
V <u>RESEARCH ACTIVITIES</u>			
VI <u>OTHERS</u>		To shorten primary education by one year from 6 to 5	

COUNTRY	TOPIC	THAILAND	
		Trends	Comments/Problems
I	<u>OBJECTIVES</u> National	Universalization of elementary education Improvement of the quality of education	
II	<u>CURRICULUM DEVELOPMENT &amp; INSTRUCTION</u> A. Major Concerns 1. Integration of Subjects	Integration of subject matter into 5 areas of learning experiences	Some teachers have difficulty following integrated instruction plan; Resistance of teachers to change; Fear of teachers to losing prestige
	2. Relevancy of Curriculum	Move from subject or academic-oriented to life-and-society oriented in the development of curriculum aims	Too many qualities to be inculcated; Some sub-categories of aims are irrelevant for elementary pupils
	3. Curriculum Load		
	4. Emphasis on Basics		
	B. Subject Areas Languages, Mathematics, Science, Social Studies, Art & Music, Health Education, Physical Education, Others	English is no longer required but given as elective course from grade 5 onwards	
	C. Other Curriculum Areas 1. Emphasis on Moral Education	Moral Education is emphasized for character development	
	2. Emphasis on Work Orientation	Work-oriented education has been given as one of the learning areas	
	D. Instructional Approach/Strategy/Method/Programming	Move from fact-oriented to conceptual approach of content presentation; Move from teacher-centred approach to child-centred approach in teaching-learning activities	Need for more instructional materials & learning aids especially for small underequipped schools
	E. Development of Curriculum Materials	New textbooks have been developed & learning modules have been initiated to be utilized in small school	
III	<u>SUPPORTING STRUCTURES/ AGENCIES</u> A. Institutionalization of Curriculum Development Distribution of textbooks etc B. Teacher Preparation C. Others	Free textbooks are provided for the majority public school children; Lesson plans and teacher manual provided; In-service training for teachers	
IV	<u>EVALUATION</u>	Evaluation of the students' performances by the schools and not central (external) authorities; Criterion-referenced evaluation emphasized	Although internal assessment using criterion-referenced tests up to Grade 5, an external examination still exist at Grade 6. Suggestion to allow schools to cluster to take care of assessment of Grade 6 as well
V	<u>RESEARCH ACTIVITIES</u>	Research in some areas of evaluation is carried out in preparation for national assessment	
VI	<u>OTHERS</u>		



## Section II

### RESEARCH DESIGN

#### 1. *Title of the Study*

Some Major Developments in Elementary School Curriculum  
in Asian and Pacific Countries

#### 2. *Significance of the Study*

There is increasing realization in the world today that the quality of education determines, to a great extent, the quality of life in any country. Further, there is realization that the elementary stage of education requires special attention everywhere because it lays the foundation of the total educational systems.

Every country has to devise its own plans to raise the quality of education by finding indigenous solutions to the problems which may be peculiar to it. But there are also certain problems which many countries in the world have experienced.

A major thrust in the efforts of educational development in individual countries in the region of Asia and the Pacific is the universalization of primary education and its qualitative betterment. In order to attain this objective, various innovative measures are being explored in individual countries and cooperative projects are organized at the regional level within the framework of the Asian Programme of Educational Innovation for Development (APEID).

Curriculum improvement is one of the crucial means of helping realize the universalization of primary education, and some work has already been done at the regional level in the study of elementary school curriculum per se. A joint study on some major developments of the elementary school curriculum will be of great significance to reinforce the efforts of individual countries in the region to improve elementary education. In other words, this study is a further step in international cooperation within the Asian and Pacific region aimed at improving the quality of education in each country.

Through the presentation of individual papers at this preparatory workshop, knowledge about curriculum change in participating countries was updated. Considerable interest was shown in a wide range of topics and all participants gained ideas and knowledge about the success of various strategies used in other countries. This will assist them in achieving further improvements in their own educational systems. Of special interest was, for example, the fact that most nations have taken steps to integrate subjects of the curriculum. It was clear that further detailed investigation was necessary to clarify the reasons for this trend. Such a study would enable a comparative analysis to be made of the success of the various strategies used to achieve integration and the extent to which it might help achieve the aims of education within each country.

Also of major significance was the fact that a number of concerns and issues which emerged were shared by most of the countries in the region, especially by those where the drive for universalization of primary education is a major goal. These shared concerns and issues were identified and some of the were selected for further study to assist the countries in the region overcome the problems they encounter as they work towards the goal of full, personal development of every child.

### 3. *Objectives of the Study*

The objectives of the study are:

- (1) To review major trends and common concerns in elementary school curriculum within participating countries during the last ten years;
- (2) To make a detailed study of some of these major trends; and
- (3) To investigate some of the common concerns with a view to recommending strategies aimed at finding solutions to these concerns.

### 4. *Scope of the Study*

To begin with, it was decided to delimit the scope of the study to elementary school curriculum only. To identify significant aspects of curriculum to be included in the study, individual papers outlining major trends in elementary school curriculum in different countries were examined. After detailed study of this synthesis, four topics were selected that required further study. These were:

- a) Integrated Curriculum
- b) Moral Education
- c) Work Oriented Education
- d) Curriculum Load.

It was considered neither feasible nor desirable to include all the topics/aspects in the detailed study, as it was proposed, to complete the study in less than a year's time.

The above four topics were selected for a number of reasons. First, the selected topics were reported to be of significant concern in the majority of participating countries. Second, topics such as mechanics of curriculum development, objectives, and relevancy of the curriculum are internal matters for each country. Third, teaching procedures and evaluation can only be considered in the context of some curriculum areas and therefore it was decided to study these two aspects in relation to the four aspects selected for further

study. Fourth, to ensure currency of the findings, the study should be completed within a specified period of time and therefore only a number of matter should constitute the scope of the study.

## 5. Procedures

Stage 1 - Regional level: Design of the study and the preparation of the instruments.

The first step was to design the study and prepare the necessary instruments. Questionnaires were prepared in the following areas:

- A. Context: This questionnaire will provide the background information necessary to understand the country reports that are based on data gathered through questionnaires B - E. It will also provide additional information which may help to understand the overall position of school curriculum in different countries.
- B. Integrated Curriculum: The questionnaire asks for a definition of what is meant by integration, what subjects are integrated, why the step is necessary and how it is carried out in classrooms.
- C. Moral Education: The purpose is to discover the measures taken by participating countries to teach positive personal, spiritual and social values pertinent to the development of the nation.
- D. Work Oriented Education: The instrument explores what is meant in each country by 'work oriented education', the extent to which this is regarded as important and the methods used in schools.
- E. Curriculum Load: The questionnaire aims at eliciting information regarding the extent to which curriculum load is a problem in each country; whether it has affected universalization of education and what measures have been taken to overcome the problem.

Stage 2 - National level: Collection of data and preparation of country report.

- (a) Principal Investigator: Each country will appoint a Principal Investigator and supporting staff. Where possible, the Principal Investigator should be the person who attended the Regional Workshop.
- (b) The sample: Each country will select 40 to 50 schools. These should, as far as possible, include rural and urban schools, single sex and

co-educational schools.

- (c) Collection of Data: The Principal Investigator will be responsible for the collection of data in each country. This should be made through analysis of documents, observations of schools, interviews and discussions with the principals and teachers of schools selected.
- (d) Analysis of Data: Principal Investigator will be responsible for analysis of the data collected.
- (e) Country Workshop: If possible, each country should hold a national workshop comprising a group of people capable of examining and approving the analysis of data.
- (f) Country Report: Each participating country will, within the required time, prepare a national report using the recommended format. (See Annex I at the end of this Section II)

Stage 3 - Regional Level: Comparative analysis of country reports

A regional workshop will be organized for comparative analysis of the country data and preparation of the final report.

#### 6. Time Target

- |                           |   |
|---------------------------|---|
| March 1984                | - Stage 1: Preparation of the study                                 |
| April to<br>December 1984 | - Stage 2: Collection of data and preparation of country report     |
| January<br>March 1985     | - Stage 3: Comparative analysis and preparation of the final report |

#### 7. Funding

Financial provision for regional activities, including publishing the final report, will be made by the National Institute for Educational Research of Japan. Funding of activities at the national level, including the collection of data, analysis and preparation of the national report, will be primarily the responsibility of each country. At the same time, possibilities of financial assistance from Unesco, within the framework of APEID, will be explored for conducting the study at both national and regional levels.

## Questionnaire A: BACKGROUND INFORMATION

### *Introduction*

The purpose of this questionnaire is to collect the background information necessary to understand and interpret the country reports that will be based on data gathered using questionnaires B - E.

#### *1. General Information (Please be brief.)*

- 1.1 Please give the location and size of your country.
- 1.2 Give the main geographical features and climatic conditions.
- 1.3 Using the latest census figures, please give:
  - (a) the size of the population;
  - (b) the growth rate; and
  - (c) the number of children age 0 - 4, 5 - 9, 10 - 14 years.
- 1.4 What percentage of the national budget was allocated to:
  - (a) education sector; and
  - (b) elementary/primary education.during 1976, 1980 and 1984 (if available).
- 1.5 Please name the ethnic and/or religious groups in your country and state the percentage of the total population for each group.

#### *2. The Educational System*

- 2.1 Outline the structure of the educational system and state briefly the evolution of elementary school curriculum during the last ten years.
- 2.2 Please provide a statement of the objectives of elementary education in your country.
- 2.3 Briefly describe the role of the different agencies for:
  - (a) deciding educational policy;
  - (b) curriculum development;
  - (c) implementation of policy; and
  - (d) overall processes of curriculum development.
- 2.4 Give the number of years of:
  - (a) elementary/primary education; and

(b) compulsory education.

2.5 Please state:

- (a) the average class size in elementary schools;
- (b) the range of class sizes; and
- (c) the average pupil-teacher ratio.

2.6 For elementary/primary schools in your country, please give:

- (a) the total number of periods per week;
- (b) the duration of each period in minutes;
- (c) the total duration of one school day;
- (d) the number and duration of recess periods;
- (e) the minimum number of days schools are required to be open per year;
- (f) the number of compulsory subjects; and
- (g) the number of elective/optional subject (if any).

2.7 Please set out, as a grid, the time allocated per week to each subject and the maximum number of marks or score in annual examinations (if any). Please set out the grid as shown below. T stands for allocated time per week, and M stands for marks in the final examination.

Year/Time/Marks Subjects	1		2		3		4		5		6		7		8	
	T	M	T	M	T	M	T	M	T	M	T	M	T	M	T	M

### 3. *Qualifications and Training of Teachers*

3.1 Please give the qualifications and number of years of schooling for entry into teacher training.

- 3.2 What is the duration of training for elementary school teachers?
- 3.3 Please describe briefly the course content of teacher training programmes.
- 3.4 Please describe the selection process for Heads/Principals of elementary schools.
- 3.5 Outline the in-service training provisions for teachers of elementary schools.

#### 4. *Research*

- 4.1 Please survey and comment on the significant research carried out in the elementary curriculum during the last 5 years.

#### 5. *Some Problems and Issues in Elementary Education*

- 5.1 Discuss the problems of failure of pupils and dropout at the elementary school level.
- 5.2 Please give the percentage of the elementary school-age population attending school. Outline the reasons for non-enrollment.
- 5.3 Describe other major problems and issues (if any) in elementary education in your country.

## Questionnaire B: INTEGRATED CURRICULUM

### *Introduction*

Use of an integrated approach to curriculum organization has been a major development in the elementary school curriculum in many countries. The underlying assumption is that compartmentalization of learning experiences in the form of subject areas is artificial and therefore does not help in the development of child's total personality. Different countries are using different styles or approaches for the development of integrated curriculum. They are also using different methods for the implementation of integrated curriculum or for the teaching of integrated courses. This questionnaire aims at pooling the experiences of different countries so that each country gains from the experiences of the others.

### *I. Content*

#### 1. Definition

- 1.1 What is generally meant by 'integration' in your country?
- 1.2 Please describe the distinctive features of the integrated approach adopted in your country.

#### 2. Rationale

- 2.1 What are the reasons that led to the development of integrated curriculum?
- 2.2 What educational objectives are expected to be achieved through integration?

#### 3. Present Status

- 3.1 Please describe whether integration has been introduced on an experimental basis or whether it has been established as a regular programme.
- 3.2 To what extent has integration been adopted?
  - a. full
  - b. partial
  - c. none
- 3.3 At what grade level has integration been introduced?
- 3.4 What kinds of integrated activities are included in
  - a. syllabuses
  - b. textbooks/other instructional materials
  - c. classroom teaching/learning situations
  - d. others



Please check and specify.

## *II. Inputs*

### 4. Course Content

- 4.1 Please give names of subjects which have been integrated in your country.
- 4.2 Please give details if integration is based on themes/concepts/units in your country.
- 4.3 Please give details if integration is based on problems/interests/issues in your country.

### 5. Instructional materials

- 5.1 Please give details regarding textbooks, teachers guides, instructional aids, etc. prepared for the teaching of integrated curriculum.

### 6. Teacher Preparation

- 6.1 What observations have you to make regarding the teachers' work load after the introduction of integrated curriculum?
- 6.2 Please describe the teacher training programme organized for the teachers to enable them to teach the integrated course effectively.
- 6.3 Please explain what other supporting materials are made available for the teacher to teach the integrated course.
- 6.4 Please explain what types of professional guidance are made available for teachers.

### 7. Basic Requirements

- 7.1 Please specify what additions/modifications of physical facilities were provided for the teaching of the integrated course.

## *III. Process*

### 8. Teaching/Learning Strategies

- 8.1 Has there been any change in teaching methodology as a result of the introduction of the integrated course in the school curriculum? If so, please specify.
- 8.2 Please describe the mode of instruction (whole group, small

groups, or individualized) generally followed by teachers in the integrated course.

#### 9. Mode of Implementation

9.1 Is implementation of integrated courses confined to the classroom only?

If not, please elaborate when, where, how, and by whom integration is attempted?

9.2 If integrated course is taught outside the classroom, is it compulsory or can pupils attend this course according to their own choice?

9.3 If a special classroom is needed for integrated course, please specify equipment and other facilities provided for such a classroom.

#### IV. Product

##### 10. Programme Evaluation

10.1 If any study has been undertaken to evaluate the integrated approach to syllabus organization and/or to teaching, please describe the major findings of such study.

10.2 Has the pace of progress in the implementation of the integrated approach been considered satisfactory?

a. If so, what steps were undertaken to ensure success of the programme?

b. If not, please specify difficulties.

10.3 What steps have been undertaken/proposed to be undertaken to further consolidate/overcome the problems of the adoption of the integrated approach.

#### V. Future Prospect

##### 11. Prospect for the Future of the Programme

11.1 In the light of the country's experiences with the implementation of the integrated programme, what is the likely course of action?

a. Continue the programme as it is

b. Continue the programme with modifications

c. Discontinue the programme

- 11.2 If the proposal is to continue the programme with modification, please outline the likely modifications with respect to course content, instructional materials, teacher preparation, etc.
- 11.3 If discontinuation of the integrated curriculum is proposed, please give the reasons.

## Questionnaire C: MORAL/RELIGIOUS/VALUES EDUCATION

### *Introduction*

The main purpose of the questionnaire is to discover the measures taken by participating countries to teach positive personal, spiritual and social values pertinent to the national ideology and development of the individual and society. Different countries use different terms for such programmes, for example, moral, religious or values education, which are implemented in various ways.

### *I. Context*

- 1.1 List and define the terms used for this curriculum area in your country.
- 1.2 State the general objectives of the programme.
- 1.3 Indicate whether this curriculum area is taught as a subject by itself or it is integrated with other subjects. Give details.
- 1.4 At what level of school does such a programme start?
- 1.5 Is the study compulsory or optional? Please elaborate.
- 1.6 What is the time allocation for it per week?
- 1.7 If there are minority groups in your country, what provisions are made for them?

### *II. Instructional Process*

- 2.1 Do you have a separate syllabus/statement of content?
  - 2.1.1 If yes, briefly outline the content
  - 2.1.2 If no, how is it incorporated within the curriculum?
- 2.2 What instructional materials are available?
  - 2.2.1 For pupils
  - 2.2.2 For teachers
- 2.3 Who develops these materials?
- 2.4 Are materials given free to the pupils?
- 2.5 Who teaches moral/religious/values education?

Please indicate whether there are special teachers or not.

- 2.6 Is there a special training programme for teachers (both pre-service and in-service)?
- 2.7 What methods and techniques do teachers use at various grades?
- 2.8 What co-curricular activities reinforce school learning?

### *III. Evaluation and Feedback*

- 3.1 How are the pupils evaluated?
- 3.2 How are the results of evaluation communicated and utilized?
- 3.3 Please describe any system of rewards/motivation at the class level, school level and national level that may be used.
- 3.4 Has the programme been evaluated?
- 3.5 How was the evaluation carried out?
- 3.6 Please give the results of the evaluation.

### *IV. Problems and Issues*

- 4.1 Outline the problems and issues related to:
  - 4.1.1 Development of the programme;
  - 4.1.2 Implementation (including teacher training); and
  - 4.1.3 Evaluation
- 4.2 What is the prospect for the future of the programme?
  - 4.2.1 To continue as it is;
  - 4.2.2 To make some modifications in course content, materials, etc.;
  - 4.2.3 To make major revisions; and
  - 4.2.4 To take other measures.

## Questionnaire D: WORK-ORIENTED EDUCATION

### *Introduction*

The term 'work oriented education' has different objectives in different countries. These include:

- helping children to understand the importance of work;
- helping children solve practical problems in everyday life with emphasis on manual skills;
- helping children relate classroom activities to life in the community; and
- helping children to develop wholesome work habits, positive attitudes and values towards work efficiency and greater productivity.

The purpose of this questionnaire is to discover the extent to which work oriented education is regarded as important in each country, what the objectives are and what instructional methods are used.

### *I. Context*

- 1.1 What is meant by work oriented education in your country?
- 1.2 Please define other terms for this curriculum area used in your country.
- 1.3 What are the reasons for including such programmes in the curriculum?
- 1.4 State the main objectives of the programme
- 1.5 Indicate whether this curriculum area is taught as a subject by itself or it is integrated with other subjects. Give details.
- 1.6 At what level of school does such a programme start?
- 1.7 Is the study compulsory or optional?
- 1.8 What is the time allocation for it?
- 1.9 What are the main emphases of the programme? List them in order of priority (For example, the importance of work, work ethics, vocational skills ...)

### *II. Instructional Process*

- 2.1 Do you have a separate syllabus/statement of content?

- 2.1.1 If yes, briefly outline the content,
- 2.1.2 If no, how is work oriented education incorporated within the curriculum?
- 2.2 Please describe instructional materials which are available for pupils and teachers.
- 2.3 Who develops the materials?
- 2.4 Are the materials given free to the pupils?
- 2.5 Who provides these materials?
- 2.6 What use is made of locally available resources?
- 2.7 Are there special rooms/areas of land provided?
- 2.8 Who makes the provision?
- 2.9 What special equipment is required?
- 2.10 How are they provided?
- 2.11 Who teaches work-oriented courses? Indicate whether there are special teachers.
- 2.12 What type of special training programme is provided for teachers? (pre-service, in-service)
- 2.13 Do you have other supporting facilities/organizations? Please elaborate.
- 2.14 Please describe the methods used by teachers for work-oriented education.
- 2.15 What co-curricular activities reinforce school learning in work-oriented education?

### *III. Evaluation and Feedback*

- 3.1 How do the teachers evaluate their pupils' knowledge skills, attitude and the finished products of their work (e.g. things made or grown)?
- 3.2 How are the results of evaluation communicated and utilized?
- 3.3 Is the programme evaluated? How is evaluation carried out?
- 3.4 What were the results of the evaluation?

#### IV. *Problems and Issues*

4.1 Please outline the problems and issues related to:

- 4.1.1 development of the programme;
- 4.1.2 implementation (including teacher training);
- 4.1.3 evaluation of programme; and
- 4.1.4 evaluation of pupils.

4.2 What is the prospect for the future of the programme?

- 4.2.1 to continue as it is;
- 4.2.2 to make some modifications in course content, materials, etc.;
- 4.2.3 to make major revisions; and
- 4.2.4 to take other measures (please give details).



## Questionnaire E: CURRICULUM LOAD

### *Introduction*

"Curriculum load" refers to the number of subjects in the curriculum, the amount of specified content to be covered in each subject syllabus, the time available to cover this content and the number of textbooks used in the curriculum. The purpose of this questionnaire is to identify the extent to which curriculum load is a concern in each country.

Curriculum load is a relative term which may mean there are different amounts of load for children depending on their level of ability. However, in answering this questionnaire, the load for a student of average ability should be kept in mind.

1. What is generally meant by "curriculum load" in your country?
2. Has the concern for curriculum load been voiced by the teachers, parents, students, etc. in your country?

If yes, please describe the specific points made by them.

3. In general, how can the total curriculum at the elementary stage be rated?

Very heavy/Heavy/About right/Light

Please elaborate the basis for this judgement with particular reference to the number of subjects, the amount of content, the number of textbooks, etc.

4. How can the present curriculum in different subject areas be rated/judged on the following dimensions? Please answer using the following table form.
  - A. Scope of the objectives: Too wide/Wide/About right/Narrow
  - B. Difficulty of Course Content: Very difficult/Difficult/About right/Easy
  - C. Language used in Textbooks: Very difficult/Difficult/About right/Easy
  - D. Length of Course Content: Very lengthy/Lengthy/About right/Insufficient
  - E. Availability of Time: Very inadequate/Inadequate/About right/More than required

School Subject(s)	Year		1	2	3	4	5	6
Scope of Objectives e.g. Language	e.g. too wide							
Difficulty of Course Content								
Language used in Textbooks								
Length of Course								
Availability of Time								

5. To what extent do factors such as inadequacies in teacher effectiveness, lack of facilities, pressure of examinations, additional responsibilities for teachers, etc. contribute to the problem of curriculum load. Please discuss.
6. Please describe the nature and amount of homework assigned to pupils at the elementary stage.
7. Please state whether curriculum load has had any effect on such matter as enrolment and pupil achievement in the country?
8. Please indicate whether there have been any recent major study/studies conducted regarding curriculum load at the elementary stage. Please provide information regarding:
  - 8.1 title of the study/studies;
  - 8.2 procedure followed; and
  - 8.3 major findings.
9. In the light of the feedback available, has it been considered necessary to modify the curriculum?

If yes, please provide necessary details regarding modification carried out/proposed to be carried out in the following elements:

- 9.1 objectives;
- 9.2 course content;
- 9.3 textbooks;

- 9.4 instructional techniques; and
- 9.5 evaluation procedures.

## Annex I

### Proposed Format for Country Report

The workshop agreed to the use of a uniform format for the preparation of country reports. The uniformity in country reports is to facilitate comparative analysis. Country reports should be prepared in two parts. The first part should be prepared to provide an overall status/situation of the country under the common headings in a descriptive form so that it can be used in the country concerned as an independent study. The second part of the report may comprise the five questionnaires duly completed by the country. The following format is to be used for the preparation of the first part of the country report:

#### *I. Introduction*

- (a) Genesis of the Study
- (b) Procedure followed - General and Area-wise

#### *II. Perspective*

- (a) General Information (covering items Questionnaire A (Q A): 1.1 to 1.5)
- (b) Overview of the Educational System (Q A: 2.1)
- (c) Evolution of Elementary/Primary School Curriculum during the Last Decade (Q A: 2.1)
- (d) Agencies for Curriculum Development (Q A: 2.3)
- (e) Objectives of Elementary/Primary Education (Q A: 2.2)
- (f) Scheme of Studies and Weightage for Different Curriculum Areas (Q A: 2.4 to 2.7)
- (g) Teacher Training (Q A: 3.1 to 3.5)
- (h) Significant Research in Elementary/Primary Education (Q A: 4.1)
- (i) Significant Problems and Issues in Elementary/Primary Education: Problems selected for in-depth study also to be included in the study (Q A: 5.1 to 5.3)

#### *III. Integrated Approach (Q B)*

#### *IV. Moral Education (Q C)*

#### *V. Work Oriented Education (Q D)*

#### *VI. Curriculum Load (Q E)*

## *VII. Conclusions and Future Prospects*

Note: The format for the second part shall be an item to item response to the questions in each of Questionnaires A to E.

## RECOMMENDATIONS

The participants of the workshop made the following recommendations.

1. This meeting commends NIER for taking the initiative in this joint study among the countries in Asia and the Pacific, and recommends that NIER be co-ordinating agency for carrying out the study within a period of twelve months.
2. This meeting recommends that NIER contact the Unesco Regional Office in Bangkok for financial support to conduct this study at the national as well as the regional level.
3. This meeting recommends that NIER invite the National Commissions for Unesco in the countries participating in APEID to take part in the study.
4. This meeting recommends that each participating country should set up a group, comprising a Principal Investigator and supporting staff, to carry out the study.

## Appendix I

### LIST OF PARTICIPANTS

#### Participants

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# Appendix II

## INDIVIDUAL PAPERS

## Introduction

For the purposes of this paper, curriculum development is considered to be the process by which the aims, goals and objectives of education are translated into learning programmes and materials, and into criteria for making judgements about learning outcomes. As such, the process may be distinguished from the process of teacher development (including pre-service and in-service education) and the process by which evaluation procedures are determined and applied in the context of education (and schooling, in particular). In practice, of course, the three processes are often inextricably intertwined.

In Australia, as elsewhere, the process of curriculum development has many manifestations including (a) the preparation and authorisation of syllabuses and curriculum guides by specialist personnel in the Head Offices (Curriculum Branches) of State Departments of Education, (b) the construction of units of work and learning assignments by individual classroom teachers and (c) the publication of learning materials by various government agencies, commercial businesses and other organisations. Indeed, there is such a diversity of participation in the curriculum development process that it is difficult to identify any one or two manifestations that might be regarded as having some pre-eminence. In part, the complexity of the curriculum development process is due to the fact that in Australia this aspect of education is predominantly the responsibility of the several States and Territories which constitute the Commonwealth of Australia, and also to the fact that within each State/Territory system there has been over the last decade considerable devolution of responsibility for curriculum development. In spite of this, there does appear to be considerable agreement across States/Territories and a consistency through time with respect to such matters as the aims, goals and objectives of education, the scope of worthwhile learning programmes and materials, and the style of assessment to be undertaken. This seems to be particularly true with respect to primary education.

## The Objectives of Primary Education

The broad purposes of education in Australian primary schools have been defined in a variety of official documents and reports over a number of years. Most, if not all, would be in general agreement with the following statement formulated in the 1980 report, *Primary Education in Tasmania*:

The central concern of the primary school is the child. In order to achieve optimum development the child should receive respect, care and love. This should be the basis

of all relationship with the child of parents, teachers and community. Every boy and girl should be viewed and accepted as individuals, needing appropriate stimulation and challenge; there should be an appreciation of their achievements and their potential, in order to help build their confidence and their sense of self-esteem.

Similarly, there would be general agreement with the following list of objectives provided in the report, *Primary Children in the Australian Capital Territory (A.C.T.)*:

There is an expectation that primary schools should:

- encourage curiosity and children's natural desire to learn;
- provide opportunities for children to observe, think critically, analyse information, reflect and discuss their ideas with others;
- develop technical, manipulative, practical and intellectual skills;
- foster aesthetic appreciation and creativity;
- enable children to develop a set of values as a basis for understanding themselves and for making choices.

The common ground in all statements of objectives appears to be characterised by (a) a focus on the child rather than on subjects to be taught, (b) a concern to relate school and home, teacher and parents, in a common purpose, (c) a recognition of the role and functions of the school within the context of the community, and (d) a conviction that primary education is essentially education for living in the here and now and that this is the surest way of providing a sound foundation for living in what to many would seem to be an uncertain future.

It would not be correct to conclude, however, that these characteristics have received universal support. Some sections of the Australian community would argue, for example, that if "a focus on the child rather than subjects to be taught" means that there will be less emphasis on the so-called "basics", for example, literacy and numeracy, then in their opinion the objectives of primary education are dangerously "laissez-faire".

Moreover, in addition to the influence of the "back-to-basics" movement just mentioned, other influences are affecting the translation of the objectives, if not the statements of objectives themselves. These include: (a) parental and community involvement in decision-making about curriculum development; (b) the integration of mildly intellectually handicapped children into mainstream learning programmes; and (c) the impact of new technologies including computers and satellite communication systems.

## Learning Programmes and Materials

Traditionally, learning programmes in Australian primary schools have been designed within a general framework of subjects most commonly including the following:

- |                         |                                 |
|-------------------------|---------------------------------|
| - English/language arts | - art                           |
| - mathematics           | - music                         |
| - social studies        | - health and physical education |
| - science               | - religious education           |

This general framework is usually determined at the system level and most State Departments of Education usually provide syllabuses and/or curriculum guides to assist teachers in the translation of objectives. In some instances, this guidance is provided in the form of a core curriculum with a range of optional or elective studies from which a selection may be made at the school and/or classroom level.

For a number of years, the boundaries between subjects in the general framework have often been blurred and considerable integration may occur especially in the early years. As a result, new programmes have evolved perhaps most notably in the form of thematic study areas such as environmental education and media education but also in development areas such as remedial reading, languages other than English, instrumental music and interpersonal relationships, where the emphasis is clearly focussed on the needs, interests and abilities of individual children.

Apart from integration, the child-centred focus of learning programmes has also given a new significance to the notion of relevance. Many adaptations to existing programmes are occurring and taking account of the needs of special groups in the community. More relevant programmes are thus being offered in primary schools in disadvantaged areas and in those with significant proportions of indigenous and/or migrant (including refugee) children. Particular attention is being given to the needs of isolated children and most States/Territories have well-developed programmes in correspondence education and provide others through facilities known as Schools of the Air.

The learning materials used in association with these programmes are many and varied. Generally these are not "prescribed" although in a number of systems lists of recommended materials are provided and locked into procedures for making available financial grants to schools. The criteria for the selection of recommended materials are based on the requirements of the particular system's syllabuses and/or curriculum guides, or other curriculum policy guidelines reflecting new or emerging priorities for primary schools.

In the main, primary schools have well-established libraries which provide a diversity of children's literature as well as a range



of learning materials to supplement those commonly used for direct teaching purposes in classrooms. The use of non-print (multi-media) materials appears to be increasing and film and television programmes including special purpose programmes broadcast by the Australian Broadcasting Corporation continue to prove popular. Computer assisted learning is only in its infancy but seems to be gaining some momentum.

Most learning materials used in primary schools are obtained from the range published commercially both in Australia and overseas. Unlike the years to about 1970, State/Territory Departments of Education with perhaps one exception (Western Australia) no longer engage in large scale production of learning materials. Nevertheless, a reasonably wide range of materials continues to be produced by these authorities albeit in more specialised categories and in restricted quantities. Learning materials are also published by authorities such as the Commonwealth Department of Education and the Curriculum Development Centre.

#### Assessment and Reporting to Parents

School attendance is compulsory throughout Australia from the age of six years until fifteen years of age in all States/Territories except Tasmania where it is sixteen years of age. Entry to primary schools is therefore on the basis of age with intakes of new pupils usually once or twice a year. (South Australia and the Northern Territory have adopted a policy of continuous intake throughout the year.) Annual promotion with a child's age peers is the general practice but numbers of schools are displaying greater flexibility in grouping practices. Generally, streaming is rare while ability grouping within classes and across classes at the same year level is more common.

Against this background of compulsory attendance and flexibility of organisation, the assessment of children's progress and reporting to their parents is, in most cases, continuous and comprehensive involving a combination of regular testing, the collection of observational and anecdotal data including work samples and, from time to time, standardised testing. Formal reporting to parents seems to occur at least twice a year while many informal strategies are also used throughout the year.

There are no external examinations undertaken during the primary school years, progress through to the completion of at least two or three years of secondary education being assured to all children. On the other hand, regular monitoring of standards especially in certain basic subjects occurs in at least one State (Queensland), while in 1975 and 1980 national studies were undertaken to assess the levels of attainment in literacy and numeracy among 10- and 14- year old children.

## Policies, Principles and Procedures for Curriculum Development

In 1979, the Education Department of Victoria published a comprehensive manual on aspects of curriculum development in primary schools. The manual provides a statement which, as a matter of policy, seems to describe the perspective adopted by most State/Territory systems in Australia:

The Education Department provides schools with courses of study and curriculum guides in order that teachers may be guided by advances in the fields of curriculum, child development and learning. At the school level, teachers are required to make their own curriculum decisions about lesson planning, course development, evaluation strategies and reporting procedures.

In most if not all instance, the origin of such policy statements lies in the relevant State/Territory legislation. Moreover, under Commonwealth legislation, further policy statements may be provided for the guidance of teachers and administrators in schools but usually only after detailed discussion and debate involving the relevant authorities in the States/Territories.

In recent years, policy statements often supported by discussion papers on such matters as the education of gifted/talented children, the use of computers, multicultural education and equality of opportunity have been promulgated in a number of States/Territories. Through the subsequent development of guidelines and the provision of funds, materials and services, these have made a significant impact on the curriculum of many Australian primary schools.

The various State/Territory Departments of Education undertake the design and development of syllabuses and/or curriculum guides through an infrastructure of committees and project teams working part-time or full-time in Curriculum Branches or equivalent agencies. In some cases, Regional Offices may undertake similar tasks but generally they appear to concentrate on the dissemination and implementation of the system-level curriculum policies and frameworks and the provision of in-service education and advisory/consultancy services.

At the individual school level, Principals and teachers will frequently meet to plan school policy, learning programmes or course outlines sequenced in appropriate ways, and sample units of work and learning assignments. They will also keep the whole curriculum under review and, in a number of instances, will actively involve parents and representatives of the community in the process. The importance currently attached to this type of activity at the school level is reflected in the widespread acceptance of the principles of what is known as "school-based curriculum development" or "school-based curriculum decision-making", in either case, SBCE. There are many variations to this phenomenon.

## Conclusion

The last decade would appear to have been a period of considerable consolidation in curriculum development for Australian primary schools. The general framework of subjects in the curriculum has changed little but there has been increasing diversification within the framework. Integration and relevance have been two key principles in the effort to provide learning programmes and materials in tune with the widely-accepted personalised/individualised objectives of primary education. Many of the traditional patterns of assessment seem to have been maintained but these do not appear to pre-empt the curriculum as once might have been the case.

Greater account is being taken of the needs of special groups in the primary school population and of changes in Australian society. As a result, new learning programmes and materials are being developed to provide for the needs, interests and abilities of all children and the aspirations of the Australian people as a whole.

Each State/Territory Department of Education in Australia is maintaining a system-level programme of curriculum development focusing particularly on curriculum policy formulation and the development of syllabuses and/or curriculum guides. School-based curriculum development is, however, widely accepted. Through this procedure, it is hoped that there will be greater local participation and decision-making in curriculum development.

Finally, throughout Australia curriculum development has become a major focus for discussion and debate involving a far broader cross-section of interested individuals than ever before. The process is dynamic and complex yet quite clearly focussed on the well-being both now and in the future of each and every child attending school.

# Grades in Government Schools in Australia 1980

(Average age of students in each grade at 1 July 1980)

Year	N S W	VIC	QLD	S A	W A	TAS	N.T.	A C T	Year
	Higher School Certificate (b)	Higher School Certificate (b)	Senior Certificate (d)	Matriculation (b) Secondary School Certificate (d)	Tertiary Admissions Examination (b) Certificate of Secondary Education (c)	Higher School Certificate (b) (c)	Matriculation (b)	Year 12 Certificate (f)	
12	17 yrs 10 mths	17 yrs 9 mths	17 yrs 2 mths	17 yrs 1 mth	17 yrs 1 mth	17 yrs 11 mths	16 yrs 11 mths	17 yrs 11 mths	12
11	16 yrs 10 mths	16 yrs 8 mths	16 yrs 2 mths	16 yrs 1 mth	16 yrs 2 mths	Higher School Certificate (b) (c)	16 yrs 3 mths	17 yrs 0 mths	11
10	School Certificate (d)		Junior Certificate (d)		Achievement Certificate (d)	School Certificate (d)	15 yrs 4 mths	15 yrs 10 mths	10
9	15 yrs 11 mths	15 yrs 8 mths	15 yrs 2 mths	15 yrs 0 mths	15 yrs 1 mth	15 yrs 7 mths	14 yrs 5 mths	14 yrs 11 mths	9
8	14 yrs 11 mths	14 yrs 8 mths	14 yrs 2 mths	14 yrs 0 mths	14 yrs 2 mths	14 yrs 8 mths	13 yrs 7 mths	13 yrs 10 mths	8
7	13 yrs 10 mths	13 yrs 8 mths	13 yrs 2 mths	12 yrs 11 mths	13 yrs 1 mth	13 yrs 8 mths	12 yrs 6 mths	12 yrs 10 mths	7
6	12 yrs 10 mths	12 yrs 7 mths	12 yrs 3 mths	12 yrs 0 mths	12 yrs 1 mth	12 yrs 8 mths	11 yrs 5 mths	11 yrs 10 mths	6
5	11 yrs 10 mths	11 yrs 7 mths	11 yrs 1 mth	11 yrs 0 mths	11 yrs 1 mth	10 yrs 8 mths	10 yrs 6 mths	10 yrs 9 mths	5
4	10 yrs 9 mths	10 yrs 7 mths	10 yrs 1 mth	9 yrs 11 mths	10 yrs 1 mth	9 yrs 8 mths	9 yrs 7 mths	9 yrs 9 mths	4
3	9 yrs 9 mths	9 yrs 7 mths	9 yrs 1 mth	8 yrs 11 mths	9 yrs 1 mth	8 yrs 8 mths	8 yrs 7 mths	8 yrs 9 mths	3
2	8 yrs 9 mths	8 yrs 7 mths	8 yrs 1 mth	7 yrs 11 mths	8 yrs 1 mth	7 yrs 8 mths	7 yrs 6 mths	7 yrs 8 mths	2
1	7 yrs 9 mths	7 yrs 7 mths	7 yrs 1 mth	6 yrs 11 mths	7 yrs 1 mth	6 yrs 7 mths	6 yrs 7 mths	6 yrs 8 mths	1
(g)	6 yrs 8 mths	6 yrs 7 mths	6 yrs 0 mths	5 yrs 11 mths	6 yrs 1 mth	5 yrs 7 mths	5 years 11 mths	5 yrs 7 mths	(g)
	K 5 yrs 7 mths	P 5 yrs 7 mths	R 5 yrs 6 mths			P 5 yrs 7 mths	T 5 years 11 mths	K 5 yrs 7 mths	

The above diagram shows the grade in government primary and secondary schools in each State and Territory and the approximate average ages (at 1 July 1980) for each grade. For a more detailed presentation of the systems operating in each State, reference should be made to annual reports of State Education Departments. The diagram should not be taken as a comparison of academic standards of grades between States.

In all States and Territories the non government school sector has an average age grade pattern which is very similar to that for government schools. It should be noted that in some States and Territories there is a trend in both government and non government schools not to place pupils in a grade structure.

(a) In NSW in 1980 the School Census was held at 1 August

(b) External examination

(c) In Tasmania some pupils complete the Higher School Certificate at the end of Year 11 and leave school

(d) Based on school assessment

(e) Based mainly on results of the Tertiary Admissions Examination with school assessment as a component of certification

(f) Based on assessment internal in the system

(g) Schooling is not compulsory until the age of six but most children start earlier. Pre-Year 1 comprises Kindergarten (K) in NSW and ACT, Preparatory (P) in Victoria and Tasmania, Reception (R) in South Australia and Trinidad (T) in the Northern Territory. It does not include pre-primary classes in any State or Territory.

Note: For age distribution within grades, refer to age grade tables which are available on request from the Australian Bureau of Statistics.

Source: Australian Bureau of Statistics

### Introduction

The primary education course in Bangladesh extends over five years for children of the age-group five plus to ten plus. It covers five classes, I to V and constitutes a terminal stage for a large percentage of the children. It has, therefore, been thought of as a self-contained unit, even though it may also serve as a preparatory stage for the children who go in for further studies in the secondary school.

Curriculum is the heart of any educational system. While continuous teacher training is a pre-requisite for making classroom teaching a success, an updated and modernized curriculum is a must for the teacher and the taught. An obsolete and outdated curriculum can be an obstacle to qualitative education. Hence curriculum development is considered to be a continuous exercise everywhere in the world today. It means continuous research, experimentation and appraisal of curriculum which is a pre-requisite for making it suitable for classroom teaching.

### Background

Bangladesh became a sovereign and independent state on 16 December, 1971 after her victory in the War of Liberation which she waged against the rulers of Pakistan. Before independence Bangladesh was known as East Pakistan which was one of the five provinces constituting Pakistan but was separated from the rest by a distance of over 1000 miles of foreign territory. It may be mentioned here that East Pakistan had the majority of the total population in entire Pakistan.

During the Pakistan period education was a provincial subject and as such primary school curriculum was prescribed by the Education Department of the respective provincial Government. Both the rural and urban primary schools used to follow the same curriculum. The subjects taught in primary schools were the same in all the five provinces though there was a slight difference in respect of emphasis on a particular subject. The subjects taught included reading and writing of mother-tongue, arithmetic, elementary science (including health care), social studies (history, geography & civics), art and craft, religious instruction and physical education.

The Central Government set up the "Commission on National Education" on 30 December, 1958 to make a detailed survey of the entire system of education from the primary to the university stage and to submit its recommendation to the Government. The Commission submitted its report on 26 August, 1959 and its recommendations were accepted by the Government on 8 January, 1960. In order to give effect to the recommendations of the Commission in respect of the formulation of curriculum and syllabuses for primary education, the Government set up

a Curriculum Committee for Primary Education on 27 June, 1960. The following broad objectives of primary education as laid down by the Commission on National Education were kept in view by the Curriculum Committee while framing the curriculum:

- (a) To provide such education as will develop all aspects of child's personality-moral, physical and mental.
- (b) To equip a child according to his abilities and aptitudes with the basic knowledge and skills he will require as an individual and as a citizen and which will permit him to pursue further education with profit.
- (c) To awaken in a child a sense of citizen-ship and civic responsibilities as well as a feeling for his country and willingness to contribute to its development.
- (d) To lay the foundation of desirable attitudes in the child, including habits of industry, personal integrity and curiosity.
- (e) To awaken in the child a liking for physical activity and an awareness of the role of sports and games in physical well-being.

The following two objectives out of those accepted by UNESCO were also considered in framing the curriculum:

- (i) To develop international understanding and a spirit of universal brother-hood.
- (ii) To inculcate a scientific attitude.

#### Subjects of Study

The following subjects were included in the curriculum:

1. Languages:
  - (a) Mother tongue - Bengali, Urdu, Sindhi and Pushto- any one.
  - (b) Non-mothertongue- Urdu.
  - (c) Foreign Language- English (Optional).
2. Elementary Mathematics
3. General Science
4. Social Studies (including History, Geography and Civics)
5. Physical Education (including Health)

## 6. Religious Education

## 7. Arts (including music and rhythmic movement) and Practical Arts (including Free and Directed Activities and Manual work)

### Implementation

The implementation of this curriculum began in 1961 when new textbooks written on the basis of this curriculum were introduced for the primary schools all over the country.

### Curriculum After the Emergence of Bangladesh

After the emergence of Bangladesh as an independent country an education commission, namely the "Bangladesh Education Commission" was set up in September, 1972 to go into all the levels of education from the primary up to the higher and recommend suitable measures for its improvement in consonance with the hopes, aspiration and needs of a newly emerging nation. Accordingly, the Commission started its work and submitted in May, 1974 its final report to the Government for consideration.

The Commission recommended that the detailed syllabuses for the subjects included in the curriculum would be prepared by the Curriculum and Syllabus Committee.

The Government of Bangladesh appointed in November, 1975 the "National Curriculum and Syllabus Committee" in order to examine the proposals and recommendations of the Bangladesh Education Commission in respect of curriculum and syllabuses of primary education and to advise the Government for the implementation of the Commission's recommendations in this respect.

The terms of reference of the Committee were as follows:

- attainment of a high standard in the system of education and educational institutions based on national ideals and goals;
- integration of science and technology in the curricula and syllabi in order to keep pace with the present-day world.
- drawing up guide-lines for preparation of syllabi in the light of the recommendations of the Education Commission for primary, secondary, higher secondary, technical and vocational education and teacher training; and
- coordination of work by different committees set up for the above purposes.

The following objectives of education guided the Committee while framing the curriculum for primary education:

- (a) To develop an individual physically, mentally, morally, and socially through the growth of his inherent power and qualities.
- (b) To develop and create individual as well as national values for the good of the country and to inculcate in the minds of the students of every stage a sense of justice, dutifulness, discipline, good manners and to arouse a feeling of oneness in the interest of the country.
- (c) To create an attitude of respect for mutual understanding, friendship with all men, love and affection and human rights.
- (d) To prepare creative and skilled manpower through the knowledge of science and technology for the economic progress and social welfare.
- (e) To create dignity of labour in the minds of the pupils through work-oriented education and to inspire them to play active part in solving the problems relating to national development.
- (f) To prepare an individual for a particular vocation in accordance with his merit and aptitude for earning his livelihood and to inspire the pupil to solve day to day problems through practical application of knowledge.

The present curriculum in the primary level of education in terms of subjects at each grade and number of hours per week given to each subject is shown at Table 1 & 2.

Table 1: The Classes I & II Curriculum

Weekly Curriculum for Classes I and II

Subject	No. of periods per week (30 minutes each)	Length of Time per week (Hours)	Approx No of Hours per session (Assuming 36 weeks of 5 day)	Percentage of Time Available
Bengali	10	5	180	33%
Mathematics	6	3	108	20%
Environmental Studies	5	2 1/2	90	17%
Religious Education	3	1 1/2	54	10%
Physical Education	3	1 1/2	54	10%
Art and Craft	3	1 1/2	54	10%
<b>Total*</b>	<b>30</b>	<b>15</b>	<b>540</b>	<b>100%</b>

\* In addition 5 minutes each day for roll calls.  
Bengali and Mathematics are compulsory each day.



Table 2: The Classes III and V Curriculum

## Weekly Curriculum for Classess III to V

Subject	No of periods per week (at 35 minutes each)	Length of Time per week (Hours)	Approx No of Hours per ses- sion (Assuming 36 weeks of 5 days)	Percentage of time available
Bengali	7	$4\frac{1}{2}$	147	21%
Mathematics	6	$3\frac{1}{2}$	126	18%
Environmental Studies	6	$3\frac{1}{2}$	126	18%
Religious Education	3	$1\frac{3}{4}$	63	9%
Physical Education	3	$1\frac{3}{4}$	63	9%
Art and Craft	2	$1\frac{1}{6}$	42	6%
Music	2	$1\frac{1}{6}$	42	6%
English	5	$2\frac{11}{12}$	105	15%
Total*	34	$19\frac{5}{6}$	714	100% (1)

\* In addition 5 minutes each day for roll calls  
Bengali and Mathematics are compulsory each day

(1) Numbers are rounded up

Remarks:

- The duration of the period for alasses I and II will be 30 minutes and the working hours per week comes upto 15 hours with an average of 2 hours 50 minutes per day. Besides 5 minutes will be devoted to roll-call in the first period.
- The duration of the period for classes III to V will be 35 minutes and the total working hours per week comes up to 19.84 hours with an average of 3.39 hours per day. In addition to it, 5 minutes will be spent on roll-call in the first period.
- The teaching of Art and Craft and Music has to be correlated with the teaching of Bengali language at different stages.
- Physical Education has to be considered as a compulsory subject in the daily programme of work of the school.
- For classes I & II there will be textbooks on Bengali & Mathematics only.

The design and development of curriculum is a continuous process which involves research and try-out of research findings. In the past it was not possible to undertake this kind of research work which resulted in the framing of curriculum by Adhoc Committees. To remove this long-standing draw-back the Government of Bangladesh set up under the Ministry of Education an organisation, namely the National Curriculum Development Centre (NCDC) in December 1980.

#### Implementation of New Curriculum:

The National Curriculum and Syllabus Committee submitted its report on the curriculum on primary education in December, 1976. The Government accepted its report and began implementation of the new curriculum from January, 1978. New books written in accordance with this curriculum were first introduced for classes I to III in 1978 and by 1980 all the five classes of the primary stage were covered. The teachers of primary schools were given orientation on the curriculum and textbooks in order to be able to implement the new curriculum both in letter and spirit. This orientation was organised by the Directorate of Primary Education in collaboration with UNICEF (Bangladesh).

The National Curriculum Development Centre has recently undertaken the work of revision and modification of the existing primary textbooks in order to ensure that curricular objectives, contents and methodology are adequately reflected in the textbooks which are produced by an autonomous body known as Bangladesh School Textbook Board.

# PEOPLE'S REPUBLIC OF CHINA

Tang Shixiong  
&  
Xiang Shunyu

Primary education is an important component of the socialist education in China and the foundation of educational cause as well. The Chinese government always attaches great importance to it. At the very beginning of the founding of the People's Republic of China, the government formulated the primary school instructional plan, compiled and published new textbooks. In 1950s and 60s it revised the instructional plan and textbooks for several times.

After the 'ten-year turmoil', the Ministry of Education summed up historical experience, adjusted and consolidated primary education. Based on that, it revised the instructional plan for full-time five-year primary school once again in order to meet the needs of building up socialist material civilization and spiritual civilization, to conform it to our national context, to get it in line with modern construction, to develop intelligence from an early stage and to improve the quality of the new generation in an all-round way. Simultaneously, some provinces and municipalities drew up instructional plans respectively for full-time six-year primary schools while they were experimenting six-year system. At present, there are two existing primary education systems - the five-year and the six-year, but the courses given are the same.

(See Annex - The Instructional Plans for Full-time Five-year and Six-year Primary Schools)

The major principles of primary school curriculum design are as follows:

1. Favourable to children's lively and vigorous development in the aspects of morality, intelligence, physique and aesthetics.

Curriculum design is a means to realize educational objectives. According to our country's educational policy, the task of primary education is to make a good start for the pupils to develop morally, intellectually, physically and aesthetically in order to cultivate reserve labour force for modern socialist construction and to afford qualified students to higher schools. Through primary education children are expected to develop the following personality traits: love the motherland, love the people, love socialism, love physical labour and love science, they are expected to possess the primitive capabilities of reading, writing and calculating; they are expected to obtain general knowledge on natural science and social science; to form good learning habits and life style; to foster labour enthusiasm; to build up their health and have a sound development both physically and mentally.

Based on the above mentioned cultivating objectives, the following courses are offered in primary schools at present:

Morality, Chinese (including reading, writing and handwriting), mathematics (including abacus calculating), natural science, geography, history, physical training, music, art (including drawing and handicraft), physical labour etc. After-class activities such as science and technology, recreation, sports, class meeting and Young Pioneer activities are included in the instructional plan as well.

2. Reflect the needs of the development of modern science and technology.

Following measures have been taken in recent years to attain this goal:

- a. Add modern mathematics to the existing mathematics textbook.
  - b. Give foreign language courses in the areas and schools where possible.
  - c. Natural science course is offered from Grade Three to Grade Five (from Grade Four to Grade Six in six-year system primary schools), whereas it was given only in higher grades formerly. In some of the urban primary schools where conditions permit, it is offered from Grade One.
  - d. Various extra-class activities with different aims have been held to form an extra-class learning system. They have played an important part in fostering children's wide interest and hobbies, illuminating children's desire for knowledge, widening their view, developing their abilities of thinking and acting and producing creative initiative.
3. Attach importance to children's moral education.

China always attaches great importance to children's moral cultivation. Teachers are required not only to teach knowledge but also to foster children. Moral education is to be carried out in every subject according to its own characteristics. Moreover, it is stressed in the following subjects and has constantly been improved:

Morality It has been offered to all grades since the autumn of 1981. The aim of this course is, in line with pupils' actual conditions, to give lively and vigorous training of communist morality and to foster good habits and behaviour. The Ministry of Education has stipulated the instructional programme and the educational department of each province, municipality and autonomous region has compiled its own teaching materials for morality course based on the Ministry's programme.

Geography and history      These two courses were cancelled during the 'ten-year turmoil' and were reintroduced in 1981.

Through geography course, the children are expected to obtain the elementary knowledge of geography (It covers local, global, national and of the world) so as to inspire their patriotism and to impart simple knowledge about rational utilization, remaking nature and environmental protection.

For history course, the children are expected to have a preliminary idea about important historic events and historical figures both domestic and foreign. It is intended to impart patriotism and simple historical materialism to children.

Physical labour      Pupils from Grade One to Grade Three (from Grade One to Grade Four for the six-year system) are properly arranged to do some easy-to-do self-service work in spare time. Physical labour course is arranged for Grade Four and Grade Five (for Grade Five and Grade Six of the six-year system) in a planned way to organize pupils to take part in public service labour or simple productive labour. The above mentioned activities are intended to carry out the principle - to integrate education with productive labour. In rural areas, harvest holidays are given in busy season. The objectives of physical labour course is to help children to form correct attitude towards labour and form good labour habit, to foster their love for the working people, to train them both mentally and manually and to enable them to do simple manual work.

Besides, class meetings and Young Pioneer activities are arranged for all grades, which are also important affecting measures in moral education.

4. Enhance the cultivation of children's ability while improving the instruction of fundamental knowledge of each subject.

We consider, in the phase of primary school, it is no doubt imperative and important to impart fundamental knowledge of all subjects to children; what is more important is that we should foster the children's strong desire for knowledge ever since their childhood, enlighten their wisdom, help them obtain a scientific studying method and form a good learning habit, thus enabling them to learn from childhood to love studying, to know how to study effectively, to possess the preliminary ability to study on their own and the ability to analyse and solve problems with their already-mastered knowledge and skills. Therefore, the concrete demand of both passing on knowledge and fostering ability have been raised in the instructional programme and contents of every subject. Take the teaching materials of Chinese course as an example, the texts fall into three categories:

a. Texts for explanation and reading.

Teachers explain the texts to the children directly.

b. Texts for reading only.

Teachers show the children how to read without too much explanation.

c. Texts for children's self-studying.

Teachers only give the children a little help. It is mainly for the children to read by themselves and later, teachers check the effect.

The proportion of each of the three kinds of texts in the textbooks does not remain the same. From junior grades to senior grades, the proportion of the first kind decreases year by year, while the latter two kinds increase gradually. In senior grades, each takes approximately 1/3. The increasing proportion of the latter two kinds is very essential to cultivating the children's ability to study on their own.

5. Protect the children from over-loaded homework.

It is imperative to protect the children from over-loaded homework. It is beneficial for the children to have a good mastery of every subject, to develop their hobbies outside class and outside school. It is also beneficial for them to develop in an all-round way - morally, intellectually, physically and aesthetically. Accordingly, in state's instructional plan, not only are the number of courses given in each grade, the teaching hours per week and the children's total amount of activities per week strictly controlled, but also the children's homework load is limited.

In addition, the educational departments and schools of many areas have generally taken into consideration to encourage teachers to improve their approaches in instruction and to innovate the way of assessment so as to raise the quality of instruction

6. Pay attention to the link between primary education and pre-school (kindergarten) education.

A lot of differences lie between primary education and preschool education. How to link them well is a very important problem. Beneficial experiments are being conducted in many places.

Another problem that should be taken into consideration is that China is a country with a vast territory and a large population. The economic, cultural and educational developments are uneven in different areas. Natural conditions differ greatly. With regard to primary education, 890,000 primary schools spread all over urban and rural areas, the majority in rural areas. Therefore, it is considered that the combination of unification and diversity is the crucial guideline for universalizing primary education in our country.

The unification and diversity embody in the following aspects:

1. Education in different forms

Flexible and various forms of education are adopted to suit the local context of different places under the guiding light of the state's unified educational policy. There are full-time schools run in accordance with the instructional plan stipulated by the Ministry of Education; and primary schools which only give Chinese, mathematics, morality, common knowledge courses; and furthermore, there is a variety of simple primary schools, classes, learning groups including half-day, every other day, itinerant teaching etc., which mainly teach Chinese and mathematics.

2. Unification and diversity in the contents of courses

Though there are unified textbooks for the whole country, differences are allowed to exist according to local conditions. The provinces, municipalities and autonomous regions are allowed to compile their own supplementary materials respectively to meet their own needs, thus solve the problem of urban and rural differences.

For example, in rural areas, natural science course is given to senior grades only. Besides, agricultural knowledge, forestry knowledge and animal husbandry knowledge courses are also offered in rural areas where necessary.

Another example: There is no special textbook for abacus calculating teaching in urban areas. It is taught in the mathematics class. In rural areas there is an abacus calculating textbook.

3. Unification and diversity embody in the integration of state-compiled textbooks and local-compiled teaching materials guided by the unified instructional programme as well.

With the development of modern construction of China, our curriculum design, instructional plan, instructional contents and approaches are constantly being innovated. Therefore we highly value strengthening international exchanges in the field of education and hope to develop our primary educational cause through mutual understanding and mutual inspiring.

## ANNEX I

## The Instructional Plan for Full-time Five-year Primary Schools

Periods per week Subject \ Grade	1	2	3	4	5
Morality	1	1	1	1	1
Chinese	11	12	11	9	9
Mathematics	6	6	6	7	7
Natural Science			2	2	2
Geography				2	
History					2
Physical Training	2	2	2	2	2
Music	2	2	2	2	2
Art	2	2	2	1	1
Physical Labour				1	1
Self-studying and Extra-class Activities	7	7	7	7	7
Total Hours at School Per Week	31	32	33	34	34

## ANNEX II

The Instructional Plan for Full-time Six-year Primary Schools  
(Trial Plan for Beijing)

Periods per week Subject \ Grade	1	2	3	4	5	6
Morality	1	1	1	1	1	1
Chinese	11	12	12	11	9	9
Mathematics	6	6	6	6	6	6
Natural Science				2	2	2
Geography					2	
History						2
Physical Training	2	2	2	2	2	2
Music	2	2	2	2	2	2
Art	1	1	1	1	1	1
Handicraft	1	1	1	1		
Physical Labour					1	1
Self-studying and Extra-class Activities	7	7	8	8	8	8
Total Hours at School Per week	31	32	33	34	34	34



The Perspective

In India, which is at present divided into twenty two States and nine Union Territories, school education is primarily the responsibility of State Governments, the Union Government concerning itself with the formulation of educational policies and co-ordination of educational facilities. The Union Government secures co-ordination in regard to school education by involving all the State Governments in the formulation of educational policies. The National Council of Educational Research and Training (NCERT) is responsible for the development of model curricula and instructional materials which are either adopted by the States in toto or with some modifications keeping in view specific local needs and conditions. Such a constitutional provision has resulted in variations in structure of school stage, scheme of studies, weightage for different curriculum areas and even in the courses of study. However, sufficient commonality in the form of core curriculum has become possible through the advisory role of the Union Ministry of Education and also through the participatory mechanism evolved by the NCERT for the development of model curricula.

Elementary education in India had traditionally performed three main functions: (i) imparting of literacy, (ii) preparation for secondary schooling; and (iii) preparation for entry into lower level jobs. Mahatma Gandhi felt dissatisfied with the prevalent system of elementary education and proposed an alternative programme known as Basic Education which aimed at providing education in and through life. He emphasized the need for the harmonious development of child's personality by replacing information-oriented curriculum with life-oriented curriculum. Mother Tongue and Productive Craft found a significant place in his scheme of Basic Education. Later on, the Indian Education Commission (1964-66) felt that the essential principles of Basic Education were so important that they should guide and shape the educational system at all levels. The National Education Policy resolution (1968) recommended that work experience and national service should form an integral part of education. In the light of the recommendations of the Education Commission and the pattern proposed in the National Policy Resolution, the NCERT brought out "The Curriculum for the Ten Year School - A Framework" (1975) which emphasized that for harmonious development of child's personality, it was necessary not only to expose him to scholastic areas for intellectual development but also to put him in situations where he could get opportunities to work with his hands.

The introduction of 10+2 pattern of education during the recent past involved basic changes in the approach as well as content of curriculum from the primary stage to senior secondary stage. Many states have revised their curricula in the light of guidelines given

in the Curriculum Framework developed by NCERT. A study of existing curricula in different states reveals the following new trends in the elementary school curriculum.

## 1. New Approaches to Curriculum Development

There has been increasing realisation during the past few years that alternative strategies aimed at improving the process of curriculum development should be explored. One such strategy is the 'survey' which provides baseline data regarding various aspects of the existing situation. Besides being an effective teaching-learning strategy, environmental survey is also being increasingly utilized as a strategy for curriculum development.

It has been realized that in India of today, the formal system alone will not be able to achieve the national goal of universalization of elementary education. It has to be supplemented by part-time education through the non-formal system. With a view to establish the bonafides of non-formal education, it was felt that a Minimum Learning Continuum commonly applicable to all learners should be developed. Minimum learning has been defined as learning based on the essential competencies expected of most of the children by the end of five years of primary education. Continuum has been defined as a progression of a competency from the earliest learning experiences to the level expected to be achieved at the end of five years of schooling.

The concept of Minimum Learning Continuum has considerably influenced curriculum development at the elementary stage. It is admitted that, though curriculum has to be built around local situations which vary largely, yet the basis must be a core of competencies common for all for comparability and certification. The NCERT came out in 1979 with a Minimum Learning Continuum in six areas, namely Mother Tongue, Mathematics, Environmental Studies, Healthy Living, Socially Useful Productive Work and Creative Expression. This has provided a much needed scientific base to curriculum development in the country.

## 2. Curriculum for Increasing the Attracting and Holding Power of School

The high rate of drop-out and enormous absenteeism are serious problems of education in India. The problem is more acute in the case of girls and in the case of children from the weaker sections of the community, who do not fully realise the value of education and for whom the children are an economic asset. While attempts are being made to develop part-time education and non-formal education, it has been felt necessary to make suitable improvements in the curriculum so as to make it relevant to the specific needs of the learners and thereby increase the attracting as well as holding power of the school. The general policy is to have only the mother tongue or the regional language as the medium of instruction but to facilitate communication, some exceptions have been made in the case of scheduled tribes. Provision has

been made to impart instruction through the medium of major tribal dialects in classes I and II.

### 3. Integrating Curriculum with Environment

There is increasing realization that there should be integrated curriculum for classes I-V, instead of the usual compartmentalized subjects. To begin with, integration has been attempted in the case of social studies and general science by putting them together under environmental studies. The purpose is to help pupils to enrich their experience through observation and participation in their environment. Since the environment and the experience of the children outside the school vary from place to place, the activities provided in the school have to vary so that experience drawn from the child's environment, becomes the base for his learning. Environment has been visualised as the co-ordinating agent for both curriculum planning and curriculum transaction.

Environmental Studies starts right from class I and is continued upto class V. While no textbooks are prescribed for classes I and II, for classes III to V there are textbooks in Environmental Studies for both social studies and general science. For classes I and II, a Teacher's Guide giving a combined treatment of both physical and social environment is provided. The guide aims at orienting the teachers to the new approach so as to enable them to transact the course in an effective manner. In classes III-VIII, the child is expected to understand the environmental perspective through the study of life in different parts of the country and also of the world. To achieve this end, science comprising physics, chemistry and biology and social studies comprising history, civics and geography have been made essential components of curriculum at the upper primary and middle stage of education.

### 4. Integrating Curriculum with Work

The Ishwarbhai Patel Review Committee (1977) felt that there was need to replace the concept of work experience by that of Socially Useful Productive Work. The Committee reaffirmed that the Gandhian concept of Socially Useful Productive Work was needed to give right orientation to the system of education. However, the Committee stressed that it did not advocate merely education plus work but education in and through work. Regarding content of SUPW, the committee visualized that in classes I and II, the course may comprise such activities as: helping in work situations in the home, in the school and in the community; and in manipulating simple material with simple tools for creative expression. In Classes III-VII/VIII the course may comprise activities pertaining to the following six areas: Health and Hygiene, Food, Shelter, Clothing, Culture and Recreation, Community Work and Social Service. Regarding time allocation, the Committee recommended that at the primary stage 20% of the total school time and in classes VI-VIII, 6 hours out of a total of 32 hours should be allocated for this

area.

The feedback received so far from the states suggests that a good beginning has been made and the implementation of this programme in some states is quite satisfactory, at least in some if not in all schools.

#### 5. Increasing Emphasis on Science and Mathematics

Keeping in view the needs of modern living, science has been made a compulsory area of school curriculum right from Class I to class X. Its weightage, both in terms of time allotment and marks allotment has increased during the past few years. In primary classes, science is taught as a part of environmental studies. In classes VI to VIII, in some states, physics, chemistry and biology are taught as disciplines under the nomenclature of science or general science. Some other states have developed an integrated course of science upto class VIII.

Mathematics is also an essential component of school curriculum during the entire period of general education. At the primary stage, the child is introduced to numbers; the fundamental operations on them and their elementary properties; concepts of length, weight, time, area and capacity alongwith units of their measurement; geometrical forms and figures and elementary notion of algebraic symbols. Simple applications of the fundamental operations and arithmetical processes to everyday problems find an important place in the primary school curriculum.

#### 6. Art, Music and Other Aesthetic Activities

Balanced development of child's personality has been recognised as the global objective of education at the primary stage. This requires inclusion of non-scholastic areas like Arts and Physical Education in school curriculum. Art Education has been a much neglected area in the school curriculum. Whatever little art education was imparted the emphasis was laid on the skills and not on the development of aesthetic appreciation which should permeate all activities and which is now visualised as the goal of art education. To achieve this objective, subjects like fine arts, music, dance and drama are included in the primary school curriculum. Co-curricular activities also aim at the balanced development of child's personality and therefore, these have been recognised as integral part of elementary school curriculum. There is a trend to involve as many students as possible in activities like dramatization, singing, poetical recitation, declamation, excursions, and puppetry which generally aim at releasing the creative potential of children. In this regard, it is worth mentioning that the movement of community singing is fast spreading in the country.

#### 7. Health and Physical Education

Another area having vast potentialities for the wholesome development of child's personality is the area of health and physical education.

Previously the area was designated as physical training in which more emphasis was laid on drill or formal activities. But nowadays, it denotes a broad-based programme of physical education which also includes instruction in healthy living. There is a trend these days to include Yogic exercises in the curriculum of physical education.

#### 8. New Areas of School Curriculum

Due to newly emerging national priorities, demands are made from time to time by experts in different fields of social and economic activities in the country to include a variety of topics or activities in the school curriculum. It is obvious that each and every topic cannot be accommodated in the school curriculum lest it becomes over loaded. However, themes like value education, population education and environmental education which have increasingly assumed much importance in the present day world, have been incorporated in school curriculum. But it has not been considered desirable to devise separate courses for these themes. Instead they have been integrated with the subject-matter of the existing areas of curriculum.

#### 9. New approaches to Curriculum Implementation

Transaction of Curriculum has received more attention in recent years than it received hitherto. Curriculum transaction requires development of instructional materials and training of teachers in the use of instructional materials and also in the use of appropriate teaching-learning strategies. Besides textbooks, curriculum development agencies in the country have started developing a variety of support materials. Instructional technology has found an important place in the transaction of curriculum. Though on a limited scale, one also discerns a trend to reduce single channel lecturing by introducing interactive teaching strategies like role playing, guided discussion and discovery learning.

# JAPAN

Koji Kato  
&  
Yoshihiko Arimoto

## Introduction

In Japan, a single-track 6-3-3-4 system was introduced by post war reform in 1947, and 9-year compulsory education comprising 6-year elementary and 3-year lower secondary was established. The general goals of education are indicated in the Fundamental Law of Education, and the School Education Law specifies the aims and objectives for each school level.

Curriculum for elementary, lower secondary and upper secondary schools is compiled and enforced pursuant to legislation. The Minister of Education, Science and Culture is authorized to establish curriculum standards, and they are organized in accordance with the courses of study prepared and published by the Minister.

The Course of Study provides each school with the basis for concrete teaching plans and programmes. Nevertheless, the Course of Study only provides a general standard which each school applies flexibly. In forming the curriculum, each school is allowed to give consideration to the situation of the school and local conditions so that the curriculum will be as suitable as possible and match the developmental level and experience of the students.

A Course of Study is provided for each school level, i.e., each of elementary, lower secondary, and upper secondary schools. The first part of the Course of Study contains general provisions concerning the school as a whole. In the second part, the objectives, content, and remarks about the content through the grades are presented for each Subject and grade level. In the third part, the objectives and content of Moral Education are presented, followed by the objectives, content, and methods of Special Activities.

## Improvement of Curriculum Standards

The Courses of Study for elementary and lower secondary schools have been revised four times since the first one in 1947, in order to change the content of education in response to the needs of the times.

As for the procedures of revision, the Minister of Education, Science and Culture first asks the Curriculum Council, an advisory body, to deliberate principles and basic ideas for the revision, and the Council carefully investigates and discusses the matters involved. Finally, the Council submits a report to the Minister. Then, on the basis of this report, the Minister takes the necessary actions in

revising the curriculum standards, which involve revisions in the related laws and the Course of Study.

The Curriculum Council consists of 60 members, including scholars, researchers, teachers, principals, and educational administrators. In addition, from the Ministry of Education, Science and Culture, the Director in charge of school curriculum, school supervisors and subject specialists of the Elementary and Secondary Education Bureau sit on the Council.

The Ministry of Education, Science and Culture takes the next step by forming "Committees of Collaborators for the Revision of the Course of Study" for each Subject, Moral Education, and Special Activities. Each committee inspects the related part of the Course of Study and makes its own proposals. Each committee consists of 20 scholars, researchers, teachers, and teacher consultants from the board of education.

#### (1) The First Course of Study

The first Course of Study introduced in 1947 consisted of two parts - the first devoted to the general principles, and the second to specific Subjects such as Japanese Language, Arithmetic, etc. It was prepared under the guidance of GHQ of the Allied Forces and reflected the occupation policy.

#### (2) 1951 Revision

The first Course of Study was compiled in a very short time under the urgent need of educational reform after the war. Great inadequacy resulted in an overall revision in 1951 to improve the Course of Study.

#### (3) 1958 Revision

The occupation ended in 1952, and Japan became independent. As an independent nation, the government had to provide curriculum standards suitable for the nation. For the purpose, the related laws were revised, curriculum standards were presented clearly, and each school was obligated to observe the standards strictly. After this revision, the Course of Study became a notification of the Ministry of Education, Science and Culture issued separately for elementary, lower and upper secondary schools.

#### (4) 1968 and 1969 Revisions

Daily life rapidly improved, and cultural and social changes were quite striking in the 1960's. At the same time, Japan's place and role in international affairs became more important than before. It was thus necessary to revise the content of education to meet the demands of the times. The Course of Study for Elementary Schools was revised in 1968 and that for Lower Secondary Schools in 1969.

## Latest Revision and Basic Ideas Incorporated in the Present Course of Study

In November 1973, the Minister of Education, Science and Culture asked the Curriculum Council for advice on the revision of curriculum standards for elementary, lower and upper secondary school, and the Council submitted its report on the matter in December 1976. In this report, the Council suggested that the curriculum revision should be made to promote development of the ability in students to think by themselves and make good decisions. At the same time, the Council considered it necessary to emphasize the following matters in the revision:

- 1) Developing warm-heartedness in students;
- 2) Providing for a more relaxed, satisfactory school life, and
- 3) Further providing for the acquisition of important basic contents and the adapting of education to the personality and ability of each student.

On the basis of these recommendations, the Course of Study for elementary and for lower secondary schools were revised in 1977 and that for upper secondary schools in 1978. These revised Course of Study were enforced in 1980 for elementary schools, in 1981 for lower secondary schools and in 1982 for upper secondary schools.

In revising the content of elementary school curriculum, consideration was made on the following:

- 1) Inculcation of the basic behaviour required for everyday life throughout all the educational activities of the school, and development of pupil's ability to practice morality;
- 2) Development of basics for healthy and strong body and improvement of physical strength through the intensifying of physical exercises in all the educational activities of the school.
- 3) Firm acquisition of the fundamental skills such as reading, writing and arithmetic;
- 4) Deepening of interest in the national and local nature and history, and the development of pupil's feelings to value them;
- 5) Enrichment of the sentiment through the joy of appreciation of the beauty of music and arts, and of expressing them;
- 6) Experiencing the joy of production and work through the productive activities using hands and work-experience activities.



Instructional programmes of elementary schools are composed of regular subjects (Japanese language, social studies, arithmetic, science, music, arts and handicrafts, homemaking and physical education), moral education and special activities.

The standard number of yearly school hours in elementary school is given below:

Standard Number of Yearly School Hours<sup>(1)</sup> in Elementary Schools

Subjects	Grade					
	1st	2nd	3rd	4th	5th	6th
Japanese Language	272	280	280	280	210	210
Social Studies	68	70	105	105	105	105
Arithmetic	136	175	175	175	175	175
Science	68	70	105	105	105	105
Music	68	70	70	70	70	70
Arts and Handicrafts	68	70	70	70	70	70
Homemaking	-	-	-	-	70	70
Physical Education	102	105	105	105	105	105
Moral Education <sup>(2)</sup>	34	35	35	35	35	35
Special Activities <sup>(3)</sup>	34	35	35	70	70	70
Total	850	910	980	1,015	1,015	1,015

(Notes)

- (1) One school hour is defined as a class period of 45 minutes. The schools must give instruction for 35 weeks or more per year.
- (2) In private elementary schools, a part or all of the school hours for moral education may be replaced by religious education.
- (3) "Special activities" include pupils' assemblies, club activities, school events, and guidance.

In view of the importance given to the acquisition of knowledge and skills and the fostering of proper attitudes and habits through the concrete and comprehensive activities, it is stated in the general provisions of the Course of Study to pay due attention to the use of an integrated approach especially at lower grades.

Some Research Works for Further Improving Curriculum

The Ministry of Education, Science and Culture is undertaking research projects for further improving curriculum, and one of the projects is on the development of curriculum to make closer inter-relationships between pre-school education (at kindergartens) and elementary education in order to meet the physical and mental development of the children.

In this project, an attempt is made to develop a curriculum which incorporate such contents as "numbers", "words" and "physical education into comprehensive play activities in kindergartens. It is also attempted to develop a curriculum for elementary schools which includes "living life" as an integration of social studies and science on the basis of the children's life for the comprehensive study at Grade 1 and 2.

It is recognized that it is necessary to develop a new subject structure for lower grades different from middle or upper grades, if it is taken into account the physical and mental development of the children at this stage as well as the continuity between pre-school education at kindergartens and education at elementary schools. There is a need to make a study further in this respect.

As for the instructional method in elementary schools, it is urged to develop new instructional methods which incorporate group instruction and individualized instruction.

1. Background

Malaysia has a centralised educational system whereby all matters pertaining to education whether curriculum, teacher training, finance, or development is planned at the central level. However, implementation of educational projects is the responsibility of the fourteen states office of Education.

Elementary education is a six year programme for equivalent Grade 1 through 6. Children enter Grade 1 at the age of 6 years. The school year begins in January. Elementary school enrolment is 96%, and rate of retention of pupils through Grade 6 is fairly good. Elementary education is free, but not compulsory.

There are three mediums of instruction at the elementary level, i.e. the National Language (Bahasa Malaysia), Chinese and Tamil. Parents could enrol a child to attend any type of school. However, all schools follow the same curriculum through the common-content syllabus provided for by the recommendation of Razak Report on Education (1956). All children have the opportunity to master the National Language, and English Language as the second official language of the country.

2. Major Trends in Elementary Education

The period 1970-84 has been a period of rapid changes and development in education, in particular at the elementary level. National objectives during this period have given emphasis on economic development and restructuring the society, and education is given prominence as one of the major strategies adopted. In 1974 The Malaysian Government established a Cabinet Committee to review the Implementation of Educational Policies in the country, and its report released in 1979 made 173 recommendations towards improvement, and 20 of these recommendations are related to elementary curriculum.

Public concern about the quality of elementary education had focused on its curriculum. Such concern necessitated a review of the elementary school curriculum, and on December 8, 1980 the Minister of Education announced a total review and renewal of the curriculum, and a New Primary School Curriculum (NPSC) would be implemented in stages starting in 1983 in Grade 1. The impetus for, and inputs into, NPSC are from several major trends in elementary school curriculum as follows:

(a) National Integration

Malaysia is a multiracial society. Historical events have tended

to promote the development of parallel schools with different mediums of instruction, with different sets of syllabi and textbooks. The policy of common-content syllabus whereby all pupils acquire the same content in the curriculum is a positive step towards fostering a common outlook and understanding. In 1970, the government proclaimed 'RUKUNEGARA', which sets out the national ideology all Malaysians should aspire to. All children are required to be proficient in the National Language, i.e. Bahasa Malaysia. In 1971, the implementation of Bahasa Malaysia as the main medium of instruction was started. All previous English medium primary schools now use Bahasa Malaysia as the medium of instruction.

(b) Rapid Industrialization

Rapid industrialization is now taking place in Malaysia. There is planned diversification of economic activities to be more industrial-based. There is a need for more technical, skilled manpower.

Within the school system, there is more emphasis on technical and science subjects as early as the elementary level. Within the last few months, two new subjects are introduced at the elementary level: Commerce which is integrated into Mathematics, and Manipulative Skills which is a practical-based subject to familiarize children with simple to complex machines.

(c) Quality vs. Quantity

Until late 1960's the Ministry of Education in Malaysia has given attention to providing a place for every child in education. In early 1970's, all children is assured of a place in the school system, and the automatic promotion provided 9 years of education for all children. Attention then shifted to raise the quality of education provided in the schools. The Dropout Report (1973) made several recommendation to improve the quality of education in particular for rural children: there should be provisions of pre-school experiences in rural areas, a programme of compensatory education be provided for less fortunate children, and a textbook loan scheme should be introduced to help children from less fortunate homes.

In early 1970's too, several curriculum improvement projects were introduced towards raising the quality of education in the school system. This is in view of several needs that arose from the curriculum at that time which was subject based and compartmentalised. Other than general objectives there was no systematic attempt then to identify the skills and attitudes to be acquired by children at the elementary level. These projects are in areas of Science, Mathematics and Languages in both elementary and secondary levels.

(d) Institutionalization of Curriculum Development

In late 1960's and early 1970's the Ministry of Education conducted many subject-based curriculum projects. Such projects were carried out by ad hoc committees which were expected to write a syllabus and later be expected to implement the syllabus in the schools. This procedure of work had many disadvantages, in particular curriculum work was at its best part-time, the ad hoc groups had other responsibilities. Syllabuses were produced, but there were limited production of support materials such as teachers' guides, teacher-pupil materials, or strategies for evaluation.

In 1973, the Ministry of Education established the Curriculum Development Centre, and curriculum development was formalized, officers were working on curriculum projects full-time. Strategies for curriculum development were stream-lined. Facilities for research, evaluation, development, teacher-training and workshops were provided at the centre. Although the CDC is responsible for curriculum development, other agencies are invited to participate in planning and developing programmes, to date representatives from many groups have participated in curriculum development, including teachers, teacher trainers, administrators, parents, university lecturers, political groups, religious groups, and representative from Teachers' Unions.

(e) Recent Research in Curriculum and Learning

While the content of all curriculum projects are Malaysian-based, the process of curriculum development takes into account recent research in curriculum and learning conducted in other parts of the world, including the States, United Kingdom, and other Asian and ASEAN countries. Debates on "Return to Basics", "process vs content", explosion of knowledge and findings from such projects as Mastery Learning, Compensatory Education, the development of summative and formative evaluations have been reviewed and studied.

3. The New Primary School Curriculum (NPSC)

The objectives of NPSC is the balanced and total development of the child, i.e. cognitive, social, affective, psychomotor, talent. 'Initially the child should acquire the basic skills of 3R's: reading, writing, and arithmetic. Direct learning of knowledge is postponed until he has mastered the basic skills. During the early learnings of the 3R's, acquiring knowledge will be through incidental learning of the 3R's. Throughout 6 years of elementary school, the child will have 3 major sets of experiences: Communication including 3R's though such subjects are Language (Bahasa Malaysia/Chinese/Tamil/English), and Mathematics: Man and His Environment through subjects: Islamic Religious Knowledge (for Muslim students). Moral Education (for Non-Muslim students), and Man and Environment; and Individual Development through three subjects: Art Education, Physical Education, Music. (See Appendix 1).

NPSC is implemented through a decentralized approach. The responsibility of the teacher preparation, administration of materials and finances, and monitoring of the programme is given to each State Education Office.

NPSC is in its 3rd year of limited implementation, and 2nd year of nationwide implementation. It is too early to make judgements on the success of the programme. Evidences do indicate however, that children are more actively involved in classroom activities, teachers find teaching more fulfilling and satisfactering.

The progress of NPSC is constantly monitored. A full scale evaluation of NPSC with focus on 4 components: Materials, Dissemination, Classroom Context, and Achievement, through longitudinal studies, test on cognitive, affective and psychomotor domains and other related techniques is underway. Data from their evaluation will be valuated to further improve curriculum development and implementation of NPSC.

## Appendix 1

### MINISTRY OF EDUCATION, MALAYSIA THE NEW PRIMARY SCHOOL CURRICULUM

#### Brief Description

##### 1. PHILOSOPHY

- \* skills and knowledge should be acquired through direct experiences and active pupil involvement;
- \* classroom organisation, teaching strategies and selection of teaching-learning materials to be flexible;
- \* process of evaluation is to increase the effectiveness of teaching-learning process in the classroom;
- \* the school environment should lead children towards problem solving, exchange of ideas and development of understanding and cooperative living.

##### 2. AIMS

- \* overall development of the child: cognitive, affective, psychomotor;
- \* acquisition of skills and knowledge.

AFTER SIX YEARS IN THE PRIMARY SCHOOL, THE CHILD WILL BE ABLE TO:

- \* master Bahasa Malaysia as the national and official language of the country;
- \* acquire basic language skills, i.e. speaking and listening, reading and writing in the medium of instruction;
- \* master basic skills in arithmetic;
- \* acquire basic study skills based on the 3R's;
- \* read, write, converse and comprehend English as the second language of the country;
- \* develop desirable attitudes and good behavior based on humanistic and affective values accepted by society based on RUKUNEGARA;
- \* acquire knowledge, understanding and develop interest and sensitivity towards man and his environment;
- \* socialize and respect the rights and abilities of others, and

to have the spirit of cooperation and toleration;

- \* develop talent, leadership qualities and self-confidence;
- \* have interest in, understand, appreciate and participate in arts and recreational activities within the context of the national culture.



## Introduction

Nepal is a mountaneous country situated between two big nations India and China, with an area of 140,080 square kms of which approximately 15% of land is arable. It has predominantly an agrarian economy. About 91% of the total population live in the villages. They are engaged in agricultural avocations. Among 15 millions of its population, around 90% are Hindus, 5% Budhists remaining 5% include other communities. There are more than 10 languages and dialects. Among these Nepali language is the mother tongue of 58% of its population. It is the national language spoken and unerstood by the bulk of population.

Development, which is of prior and pramal need for nepalese, can only be achieved through the proper involvement and utilization of the human element and the effective turn-out of manpower which depends on its internal as well as external efficiencies, such efficiencies of human beings flourish through the development of knowledge, change in attitudes and readiness to learn and practise new skills and techniques. This can only be ensured through a well planned education system.

Keeping these ideas in view the National Education System Plan (NESP) was introduced in 1971. The NESP aims at the following:

- (a) To further consolidate and strengthen faith in loyalty to the crown and the country by harmonizing different economic and social interests, by integrating multi-lingual traditions into one all embracing nation by encouraging economic and social mobility and by transferring the geopolitical entity of Nepal into a positive emotional integration.
- (b) To comprehend the old and new teaching methods currently enforced in the country within a New Education System and to bring about uniformity in the intellectual traditions so that national solidarity may be further developed and strengthened.
- (c) To supply trained manpower for national development and to generate a deeper faith in the national heritage and the Panchayat System. (NESP. Page 9)

Before the dawn of democracy in 1951, one percent of the total population was literate. Between 1951 and 1970, the literacy percentage was raised to 13% giving us a total of 12%. The promulgation of NESP can be considered a radical approach in the development of education as in a period of about ten years the literacy percentage has risen to 23.3%.

Before the inception of NESP the structure of education was of 5+2+3 years. Under the plan primary education was made of three years. The objective of primary education is to emphasize teaching of rudimentary skills in reading, writing and arithmetic along with some instruction in an occupation connected with realities of life, specially an elementary knowledge of agriculture.

To cope with instructional activities teacher student ratio was fixed as one teacher for forty students. A certificate of school leaving examination (SLE) with about one year training in teaching was made compulsory for a primary school teacher. Sincere efforts were made to provide standard textbooks free of costs to each of the students upto grade 3 and financial grants to cover full salaries of the teachers. With the purpose of maintaining the standard of education provision of external examination at the end of Primary Education was made at the district level. After completing this examination, students were qualified to get themselves enrolled in the lower secondary schools. Subjects offered at this level alongwith their weightage are as follows:

Subjects	Weightage	Fullmarks	Remarks
Nepali language	40%	300	Actual teaching days in a year 180 days
Arithmetic	30%	200	
Social studies	20%	100	
Physical education ) Hygiene, Handicrafts ) and drawing )	10%	50	(Through various practical activities rather than teaching of textbooks

- Note: (i) Actual teaching days in a year are 180 days  
(ii) School runs six hours a days and 6 days a week  
(iii) Science as a subject at the first three grades are not taught, however, some basic concepts are integrated in Social Studies.

#### CURRICULUM DEVELOPMENT AFTER NESP

Curriculum Development Centre was established in 1971 under the Ministry of Education and the Centre was entrusted with the responsibility of developing, implementing, evaluating and revising curricula at all levels of school education and was also given the responsibility to conduct research and innovation.

CDC at the beginning initiated the vital task of translating the levelwise objectives as identified by the NESP into more specific gradewise and instructional objectives. Based on the identified objectives contents were specified and thus the new curriculum was prepared. After its approval the curriculum guides and teaching units were developed

for the use of the teachers.

Before the implementation of the curriculum, Orientation Programmes were conducted for the teachers. Provisions were also made for their continuing education. After five years of its implementation curriculum evaluation works were performed. Based on the evaluation data contents revisions were done by subject committees mainly consisting of subject teachers.

Since curriculum development is a continuous process, implementation and revision works were done from time to time. In the revision work the classroom teachers had the main hands.

#### PRESENT TRENDS

After three years of the implementation of NESP a high level mid-term evaluation committee was formed to study the overall functioning of the system. The study identified the need to coordinate curriculum development, material production and supervision system. As a result Curriculum Development Center was further consolidated and re-strengthened by incorporating textbook preparation and supervisory activities and renamed as Curriculum, Textbook and Supervision Development Center.

It is worthwhile to mention here that among 32000 primary teachers only 36% are trained and about 1/3 of primary teachers are under-qualified having under matric certificates only. But the Ministry of Education and Culture is trying to fulfill the gap of untrained teachers by providing two way processes of training the teachers. In-service and pre-service training courses are being offered by the Institute of Education. Short-term training courses, radio training Programme, and distant learning courses are to be given every year to employed teachers.

To enrich the quality of primary schooling, it has been upgraded from 3 years to 5 years and provision has been made to appoint one teacher of intermediate level in each of the primary schools. General information about the nation and character building have been added to the objectives of primary education. The recent trend includes the emphasis on:

- the teachers to use locally available materials in classroom teaching.
- in-service teacher training courses emphasized on to develop teaching skills.
- Teaching of English, science and moral education have been added.

According to the new Primary School Curriculum following courses are being offered at Grade IV and V.

Courses	Weightage	Fullmarks	Apprximate annual time in hours
Nepali Language	8	150	180
Sanskrit	2	50	45
English	7	100	157
Mathematics	6	100	135
Social Studies	6	100	135
Physical Education	2	50	45
Science and Health Education	4/2-6	70/30-100	90/45-135
Moral Education	2/39	50	45

As an innovative project, a draft integrated Primary School Curriculum (Grade 1-3) has been developed which integrated different subject matters. It is in the process of trying-out.

#### Summing up

Inspite of best efforts made during the last decades, the target of universalization of primary education has not been achieved fully so far. About 51% student dropout of the school before reaching class II. Sixty seven percent children are enrolled in out of which 94% are boys. This clearly shows that enrolment of girls is very poor. However, efforts are being made to raise the enrolment of girls in primary schools.

The education system of Nepal aims at providing quality education. A sound curriculum has been developed and textbooks have been prepared. Curriculum guides for the most of the areas have been developed for the teachers. But even a sound curriculum cannot always ensure quality education if it is not used properly. Classroom is the real laboratory to test the efficiencies of the curriculum and its success depends on how it is received by those involved in teaching-learning process.

To raise the standard of primary education the role of teaching materials and teaching personnel is by far the most important. Besides, the students coming to schools are from different stratas of the society having different social, cultural, environmental and economic backgrounds. It is said that what is done at school is undone at home.

Besides, even the trained teachers have not yet fully conceived the objectives and curriculum of primary education. This is because most of them have got traditional education and are not well acquainted with its modern concept and thus, they have not been able to create academic environment in the schools.

As regards the materials available in the present textbook of the primary education, the skills oriented materials are not up to the mark and even where it is teaching lacks the orientation of skill among the students. So attempts should be made to encourage the teachers to emphasize the teaching of skill to the students.

Availability of teaching aids like audiovisual equipment in the school is also necessary for the improvement of teaching learning environment. The poorly equipped institution having poorly equipped teachers can not be expected to impart teaching than that of today.

## NEW ZEALAND

John Kennedy Millar

### Background

New Zealand is an island nation situated in the temperate latitudes of the South Pacific. There are two main islands and a number of smaller ones, extending 2000 kilometres from north to south but seldom more than 200 kilometres east to west. Much of the country is mountainous with lowland plains around part of the coast.

The population is approximately 3.2 million with 84% being European, mainly British, descent. The indigenous Maori people of Polynesian origin are about 12% of the total with other significant groups being from Pacific Island nations, and of Chinese and Indian descent. Most New Zealanders speak English as their first language. In the last ten years increasing effort has gone into measures aimed at preserving and encouraging Maori language and to giving greater recognition to the multicultural nature of New Zealand society.

In recent years a decline in the birth rate has meant that, after several decades of rapid increase, population growth has been minimal. Forecasts indicate that the school population will continue to decline for some years. Already there has been a substantial reduction in the numbers of teachers being trained, and there is some difficulty maintaining full employment and promotional opportunities for teachers already in the service.

### Primary Schooling in the New Zealand Education System

Figure 1 provides a summary of the structure of education in New Zealand. In 1980 the primary school population numbered approximately 0.5 million. Compulsory education is from 6 years to 15 years of age although almost all children enter the primary school on their fifth birthday. Primary school extends from age 5 to 12 years.

Central Government provides the full cost of education (4.8% GDP) in New Zealand state schools and this is administered through the Department of Education. At local level, control of primary schools lies with 10 elected education boards. An inspectorate appointed by the Department of Education exercises professional leadership and control, but within schools, principals have power to organise the curriculum within the broad national guidelines prescribed by the Minister of Education.

The broad objective of the education system is to provide for every person the education "for which he is best fitted and to the fullest extent of his powers". However, national objectives for education in New Zealand are being discussed. Increasingly schools

are regarded as but one important institution in society with a stake in the provision of equality of educational opportunity. Schools attempt to provide an example of democracy in action, to promote opportunities for coming to terms with cultural differences in the New Zealand setting, to play a role in the development of the national economy and to assist personal development of the individual student.

Since its formation as a unit in 1963, the Curriculum Development Division of the Department of Education has been responsible for keeping under review the school curriculum from the infant classes (age 5 years) to the seventh form (age 17 years). Its role includes co-ordinating curriculum activities many of which are initiated by organisations such as the New Zealand Teachers associations, the inspectorate, the national examination boards, university interests and professional body interests. When pressures indicate revision is needed, revision committees, representative of all branches of the education service, are established under the authority of the Minister of Education.

When a revision committee has completed its work, the Curriculum Development Division, in association with the Department's Publication Branch, Visual Production Unit and National Film Library is responsible for preparing guidelines and up-to-date teaching materials for the new courses.

Each subject is developed on the basis of a common pattern involving the statement of clear objectives in terms of intended changes in pupils' cognitive and affective behaviour, the drafting of learning resources designed to achieve these objectives, the trial and appraisal of these materials in schools, and then revision in the light of the trial prior to publication and dissemination.

Subjects of the primary school curriculum are, language (English, including reading), social studies, science, mathematics, art, music and physical education. The syllabus for each subject is developed separately, but the principal and teachers in each school are responsible for translating the syllabus, deliberately expressed in broad terms, into a coherent school programme. Except for reading in junior classes and mathematics, textbooks are not supplied. Works books are seldom used in any subject.

Virtually all primary schools in New Zealand use an "holistic" or integrated approach to teaching. Thus, subject boundaries tend to be blurred by using "themes" or "units" especially in language, social studies, science, and art. Such an approach places considerable reliance on the ability and enthusiasm of the teachers to plan a balanced programme, divide it into topics or units, select appropriate objectives from several subjects, engage their pupils in planning units of work, select resource materials, assist their pupils in carrying out their individual or group projects and then evaluate whether the objectives have been reached. Evaluation is assisted by the use of Progressive Achievement Tests produced by the New Zealand Council for Educational Research.

Research into the primary curriculum has, in recent years, tended to focus on written expression. New Zealand is cooperating in the IEA study of composition.

### Recent Developments in the Subjects of the Primary School Curriculum

One of the major developments within the last ten years has been in reading. This has been fully documented in the New Zealand Country Paper at the APEID Seminar on Textbooks and Reading Materials held in Wellington, New Zealand, in October 1983. In brief, New Zealand teachers have a psycholinguistic view of reading, and both the practice and the materials have been strongly influenced by research. Interest and understanding come first. Reading is taught as a process of getting meaning; sounds are not taught in isolation. A major thrust in in-service has helped consolidate these ideas and practices in schools and the "Ready-to-Read" series for young children is currently undergoing complete revision. This series is supplied free to all state schools. The "School Journal", a high quality magazine for children is also supplied free and is used for general interest reading, and reference material on a variety of topics. Journals also serve in most classrooms as part of the materials used for reading instruction.

In addition to the work in reading, there have been major developments in the compulsory subjects of English, mathematics, science and social studies during the last ten years. As well as providing syllabus statements, emphasis in these subjects has been on producing resource materials for pupils. Textbooks in mathematics are provided free in all schools, but no textbooks or workbooks are produced for the remaining subjects.

Work began in 1983 on a major revision of physical education, a subject that tends to be influenced by the cool climate and variable weather conditions in much of New Zealand. Developments have also begun in art and music education during 1983.

In form 1 (the seventh year of primary education) home economics and workshop craft are added to the compulsory core. Both of these subjects are undergoing major revisions and are the only subjects taught by specialist teachers.

Maori language is the only non-compulsory subject at the primary level in New Zealand schools. A draft syllabus is at present being tried in a small number of schools.

### Summary

Overall, the trend in curriculum development in primary schools can be summarised as aiming to develop in all pupils the knowledge, skills and attitudes that are important in life and work, to promote decision making and to provide pupils with opportunities for creative expression.



# The New Zealand Education System



# 1. ELEMENTARY EDUCATION IN PAKISTAN

The span of the elementary stage of education in Pakistan covers the provision of education to the 5 to 10 age range of pupils. The primary level, comprising of grades I to V is the first cycle of education providing five years of schooling to the 5<sup>+</sup> entrant. The scheme of studies at the primary level comprises of core curricula in languages, social studies, science, mathematics, health and physical education, religious education, art, and manual work, with the addition of agro-technical component at the middle level.

## 2. ORGANISATION FOR CURRICULUM CHANGE

The National Bureau of Curriculum and Textbooks is the central agency responsible for the management of curriculum development, implementation and evaluation. It works in close collaboration with the four provincial curriculum centres and textbook boards. The Provincial Curriculum Committees working under the aegis of the provincial curriculum centres develop the first drafts of curricula which are vetted by the National Committee to bring out a uniform draft. The curricula are thus centralised and uniform for the whole country. The textbooks and teacher guides at the elementary level are however developed by the provincial textbook boards in collaboration with the provincial curriculum centres. Thus, inspite of the uniform curriculum, diversity and local relevance is achieved through the reading material for pupils and methodology for teachers.

## 3. MAJOR TRENDS IN ELEMENTARY CURRICULUM

### 3.1 General Features of Change:

During the last decade curriculum reform and revision have been a continuous process. The major emphases in all curriculum renovations have been:

- i) Integration:- Greater integration of content has been attempted in the curricula of various subjects at the elementary level, particularly in science and social studies. The old general science courses were a patchwork of topics selected from the major disciplines of science. The new elementary science is a unified approach to the presentation of science concepts. Similarly a greater intensity of integration has been achieved in the elementary social studies so that the boundaries of the classical history geography and civics have been mitigated to a great extent.

- ii) **Conceptual Orientation:-** Another major change has been from an emphasis upon the memorisation of facts to the building up of concepts. The understanding of physical and social phenomena and the gradual development of concepts is emphasised.
- iii) **Sequential Structure:-** The concepts in the curricula of the succeeding grades form a sequential structure from simple to more complex ideas so that the sequence is more conducive to the creation of learning in young children.
- iv) **Psychological Grading:-** Although research findings on the cognitive growth of children in Pakistan are as yet not available, attempts have been made through expert opinion to match the content material with the mental capacities of the children. This has been a major consideration in the sequencing of concepts.

### 3.2 New Orientations in Subject Curricula:

- 3.2.1 **Languages:-** The alphabetic method to the introduction of reading has given way to an emphasis on phonetics. Greater importance is now given to the attainment of language skills than to memorisation of lesson contents.
- 3.2.2 **Social Studies:-** Integration and sequential structure are the main features of the elementary social studies. Beginning in grade I with looking at things and people in its immediate surroundings - the home, the school and the mosque - the child is led on, in an ever widening horizon, to the study of social and environmental phenomena at the national and global levels. At grade III level there are separate textbooks in social studies for each single district in the provinces. This ensures greater relevance of the "studies" to the children's local culture and environment.
- 3.2.3 **Science:-** The topical approach in elementary science has given way to integration and conceptual orientation. The learning of concepts is emphasised instead of the memorisation of facts. Science content is now more relevant to the environment of the pupils, and the teaching strategies described in the teachers' guides suggest pupil's own activities and learning by doing.
- 3.2.4 **Mathematics:-** Pre-number concepts initiate the grade I pupil into the realm of mathematics. The concept of numbers and basic operations are introduced through "Sets" which form the basis of all further concepts.

- 3.2.5 Religious Education:- In addition to the knowledge of the fundamentals of Islam, emphasis is placed on the acquiring of moral values and positive attitudes through the subject of Islamiat for muslim students while the subject of Ethics is offered to non-muslim pupils.

#### 4. MORE RECENT TRENDS IN CURRICULUM CHANGE

##### 4.1 Integrated Primary Curriculum:-

The attempt at making teaching-learning more and more child centered at the primary level has led to the thinking that separate subjects are not relevant to the needs of the child. What is needed at this stage is the maximum opportunity for the child to meaningfully interact with the environment, both the material and the social environment. At primary level the needs of children have to be the prime consideration in curriculum design. The overloading of the curriculum due to the introduction of more and more subjects has created difficulties for both the teachers and the learners. And since, in the primary system, a single classroom teacher teaches all the subjects in any one particular grade, integration seems to be the right answer to the problem. In view of these considerations the National Education Policy 1978 recommended the development and introduction of Integrated Curriculum at the primary level.

Curriculum outline for grades I-III has been formulated. Text-book, teachers guide and teaching aids for grade I have been developed and tried out in the schools. Material for grades II and III is being developed. The basic criteria for the integrated content have been the physical, mental and social needs of the child. Maximum opportunities for physical and social interaction have been provided through pupils' own activities suggested in the teachers guide.

##### 4.2 Primary Mathematics - Disenchantment with 'Sets':-

The introduction of 'Sets' in primary mathematics in 1974 took place under the influence of the "Modern Maths" curricula in vogue in some of the developed countries. Over the decade feedback from the classrooms has been consistently negative on sets. This happened inspite of the provision of rigorous in-service training, guide books and teaching material. It came out that 'sets' did not help but in fact hindered the learning of operations at the primary level. A new primary maths curriculum has been designed but without 'Sets'. It would be implemented in 1985. 'Sets' would however be introduced at grade VI.

##### 4.3 Teaching Kits and Teacher Guides:-

The activity approach in elementary school demands the use of a considerable amount of teaching material. The National Teaching Kit developed alongwith the new primary curricula includes about a 100

items of teaching material and a manual for teachers. Teaching Kit for middle grades is also being developed.

Teacher guides in all primary school subjects were developed for the new curricula. The guides describe teaching strategies based on the activity approach. The booklets are used as basic material at in-service training courses and are very useful for upgrading teachers who could not be reached through the center-based training programmes.

## 5. TEACHER EDUCATION AND TRAINING

### 5.1 Alternate Curriculum for Pre-service Teacher Training:-

The new elementary curricula demand new skills and fresh approaches to teaching. In order to prepare teachers to meet these demands Alternate Curricula have been designed and implemented at selected primary and middle level teacher training institutions. The alternate curricula emphasize the transformation of educational theory into effective teaching practice. A greater percentage of course time is required to be spent on teaching practice by the pupil teachers. New modes of assessing teacher performance have been introduced.

### 5.2 In-service Teacher Training:-

The center-based training programmes are now gradually giving way to school-based training. School supervisors and learning coordinators have been groomed to take on the task of on-the-job training of primary school teachers.

## 6. TEACHER SUPPORT SYSTEMS

### 6.1 Supervisors and Learning Coordinators:-

Curriculum innovations, in order to live and prosper in the school system, require a continuous support for the teachers. To provide guidance and support to the teachers in the schools new posts of supervisors have been created so that they have lesser number of schools to supervise. A new post of Learning Coordinator has been created with only ten schools to look after and to act as liason between the supervisor and the school teacher. The Learning Coordinator is as yet an experimental input for the provision of school-based training.

### 6.2 Teacher Resource Centres:-

At selected school sites teacher resource centres have been established. These are also termed as Centre Schools. A small library of resource material, duplicating facilities and teaching aids are available at these centres. A learning coordinator or the area supervisor is incharge of the centre. Teachers from vicinity schools visit the centres to duplicate material, borrow teaching aids, refer the

resource library or simply to discuss their problems with the supervisors.

#### 7. NEW MODALITIES FOR THE DELIVERY OF EDUCATION

Low enrollment and high drop-out have been the major problems of elementary education with much greater severity in rural areas. As a step towards an early universalisation of the first cycle of education a Special Priority Development Programme for Primary Education has been launched. Primary schools have been established in mosques which are present in each and every single village in the country. The mosque accommodates the school and provides the services of the Imam (prayer leader) for teaching the children reading and writing. The Government provides another teacher, who has to be a resident of the locality, for teaching other school subjects. The project has had an immediate impact in tremendous increase in enrollments. The strategy has also given rise to questions about curriculum. It is being considered whether the normal subjects-based curriculum suits the mosque schools which are established primarily for the purpose of universalisation and mass spread of literacy.

## Introduction

Formal elementary curriculum development is a basic concern in Papua New Guinea (hereafter PNG). Sound human resource development is fully supported. It reflects the Government's Eight Point Plan which provides for rural development and self reliance and it ensures that all persons and parts of PNG share in the nation's development. Over and above this, it reflects the first of the country's Five National Goals and Directive Principles on 'Integral Human Development':

We declare our first goal to be for every person to be dynamically involved in the process of freeing himself or herself from every form of domination or oppression so that each man or woman will have the opportunity to develop as a whole person in relationship with others.<sup>1</sup>

Curriculum development for the first level (called Community Schools in PNG) also reflects the social, mental and other changes that are taking place within the PNG society, as well as response to external pressures. It reflects the financial and the economic dilemmas that the country faces in her endeavor to educate her people. It reflects a need for people to be self reliant within a social cohesive whole; to promote the values and desires required of useful citizens; and the need for people to remain in the rural areas where they can be self-employed rather than dream of wage employment and survival in cities and towns where the pot-holed bitumen streets certainly are not paved with the Kina (PNG's currency unit).

Within Mackinnon's stages of curriculum development - 1, Imitative Stage; 2, Derivative Stage; 3, Venturesome Stage; 4, Modern Local Stage-Development by Subject; and 5, Integrated Modern Local Stage - a brief summary will be made of the elementary curriculum development that has taken place in the past decade.<sup>2</sup> These stages explain themselves.

### Stages of Curriculum Development in PNG

A decade ago (1974) the second or derivative stage of McKinnon's curriculum development would have been over. To understand what has happened we need to start with curriculum development during the colonial period in the 60s (PNG achieved self government in 1973 and independence in 1975).

Prior to the 60s, curriculum development was barely discernible. It was an era where curriculum development was at a limited imitative and derivative stage when first the British missionaries, and later, increasingly the Australia bureaucrats used simple PNG adaptations of

the curriculum taken from England and Australia.

In the 1960s because of the more educationally realistic thoughts and actions of the second Administrative Governor of Papua, curriculum development embarked on the Venturesome Stage. G.T. Roscoe, Director of Education, starting in 1958, made plans which were not just simple imitations, and or, derivations of the Australian syllabus but a serious attempt at a syllabus that among other things, would enable the Papuan to be able to be proficient in the three Rs, to be able to use new methods of gardening and to be able to be a good citizen in his own community. It was a colonial syllabus designed to keep the Papuan in his village and place.

However, unexpected external influence enabled the Venturesome Stage to reach its all time high in the 1960s. At the emergence of politically self-determining former colonial nations, especially in Africa, and the growing importance of the UN as the dispenser of socio-political justice, Australia was forced into adopting a syllabus that prepared the native for eventual self-government.

The new syllabus aim was first and foremost to educate the lower and middle level clerk, at least at the initial stages. In 1967 the Australian government published the first set of elementary school curriculum materials for PNG. It is important to note that the syllabus material, except for The Pacific and Minenda Readers and other supplementary Readers that remain to date, were called Primary School Syllabus for Papua and New Guinea and were used in Primary 'T' Schools, (Territory) as divorced from Primary 'A' Schools (Australian Curriculum).

Currently the 'T' schools are PNG Community Schools and the 'A' schools are International Community Schools serving expatriates and members of the PNG elite who can afford to pay the high fees.

The 1967 syllabus remained in force up to and including Self-Government and Independence. With them came PNG's own constitution, its directive principles and other sets of ideologies for development.

A further aspect of the 1967 syllabus material for primary school was that the syllabus was printed with several subjects in one book. With this in mind let us turn to the next stage in elementary curriculum development.

Very little in terms of curriculum content has been changed in the current syllabus from that produced in 1967, although it can be safely argued that elementary curriculum development has entered Stage 4 (Modern Local Stage-Development by Subject). Stage 5 (Integrated Modern Local Stage) is currently being tried and felt on a beginner scale.

For reasons postulated in the introduction, the current elementary syllabus has undergone the following changes: 1, in respect to PNG's



own ideologies for development the name of the syllabus has changed from Primary to Community to embrace a new set of objectives; 2, the syllabuses are for the core subjects, wholly produced within PNG; 3, and the small syllabus booklets are printed containing the syllabus for one subject in one grade (except for Community Life Grades 2 & 3; Physical Education Grade 1 and Expressive Arts Grades 1-3).

In the latest published elementary syllabus, there are materials for English, Mathematics, Science, Community Life, Expressive Arts, Health and Physical Education Subjects. The lists for each subject are too numerous to mention here, but each subject's material is as comprehensive and updated as possible since:

The major organizational development of the 1970s was the establishment of the Curriculum Unit in 1974. This unit is within the education headquarters in Port Moresby and is responsible for planning, writing, trialling, and implementing syllabuses. Its staff has generally been composed of expatriate teachers drawn from within the country. Their job during the 1970s was to rewrite syllabuses so as to make them easier to teach and, more recently, to provide support materials. The full-time staff of about 25 professional members is often supported by part-time committees of practicing teachers, both national and expatriate. Partly because few of the people involved have formal curriculum training, development of materials largely proceeds on a trial-and-error basis, and systematic formal trialling and evaluation are unusual. One result is that, while syllabuses have become more relevant and easier to teach, they do tend to be uneven in quality.

Relevance in syllabus writing has operated in two directions. One is to make the materials more relevant to the teacher's needs and skills, the other more relevant to the goals of the country.<sup>3</sup>

Because of the decentralisation process where a total of 19 provincial governments are given some autonomy in governing their own affairs, the Community School syllabus subjects have been divided into Community based and Nationally prescribed sets of syllabuses under the Organic Law of the Constitution. The latter comprises the subjects English, Maths and Science. This syllabus is determined by the Central Curriculum Unit of the National Department of Education with instructions for all provinces to follow in order that uniform standards should be maintained. These instructions are a must.

Community Life, Expressive Arts, Health and Physical Education are non-core subjects and come under provincial functions. Though in 1983 moves were taken to include Community Life as a core subject.

The general aim of The Community Life syllabus is the encouragement of children to be useful members of the community and good citizens of PNG with inherent and learnt pride in the traditions and culture of PNG.

The general aim of community schooling is to prepare young people who don't make it up the educational ladder, for life in rural areas (two-thirds finish their education at the end of Grade 6 as there are only places in Grade 7 for one-third). It was thought that more leverage should be given to provincial governments to modify, or adapt non-core subjects to meet local conditions. However, plans for modification, and or variations must first be approved by the National Education Board (NEB).

To conclude the first part of the paper it would be interesting to speculate on the final stage of curriculum development according to McKinnon. It has been shown that elementary curriculum development has slowly been realized in PNG. This is quite true, especially within the socio-political ideologies that are currently acting as guidelines from which curriculum is developed. Real efforts are being made at integrating subjects with other subjects, such as teaching physical education as an exercise in health, or in expressive arts singing health songs; or academic subjects integrated with the social, economic and political conditions and aspects of the community. A new Community School Agriculture Pilot Project will attempt to integrate agriculture with core subjects. Certainly the decision to have Community Life, Expressive Arts, Health and Physical Education community based is a step in the direction of stage 5 (integration of subjects with each other and with the community). These subject contents, if learnt, will perhaps further the overall development of PNG.

PNG has a few singular instances where both the secondary and the elementary curriculum is designed to ensure integrated learning.

### Conclusion

This paper briefly outlined the national level of elementary curriculum development. Some important points emerge from this discussion.

First, in a developing country such as PNG, political independence and political developmental ideologies are very instrumental in the development, trial and implementation of any curriculum. PNG is like a triangle standing on its base, with the government and its constitution and development ideologies at the apex which direct and influence decisions and developments that are duplicated down through different layers until it reaches the base. In the end it is the apex that proves supreme.

Second, unlike some of the countries represented at this workshop, PNG does not enjoy the status of having universal primary education. Elementary curriculum development ends up being very selective and an onerous task. The curriculae developed are aimed at a larger proportion of people but due to non-enrolment and wastage ends up benefiting a small lucky proportion (only 67% of the age group are in community school and 14% of the age group enters Grade 7).

Third, elementary curriculum development is very basic and should

embrace all aspects of society. It is the base from which curriculum at other levels of the education system are to be developed, and the successful use of these curriculae at these higher level is dependent on the success of the elementary curriculum.

Finally, some thoughts familiar to many curriculum developers and planners. Curriculum development needs expert people to develop it, and patient hard working people to trial it, and if successful to continue using it. Although PNG has achieved a stage where it could be proud of its elementary curriculum development, it still has a long way to go as most of it is on a trial basis.

Anyway, PNG is comforted by the fact that no developing country much less a developed one has reach a perfect pinnacle of having a perfect elementary curriculum.

#### Notes

1. Papua New Guinea, Central Planning Office, (1974), Strategies for Nationhood, Policies and Issues. Port Moresby, Government Printer, p.16.
2. McKinnon, K.R., (1976), "Curriculum Development in Primary Education: The Papua New Guinea Experience" in Thomas, E.B. (ed). Papua New Guinea Education. Melbourne: Oxford University Press, p.1.
3. Weeks, S.G. and Guthrie, G. (1983), "Papua New Guinea" in Thomas, M. and Postlethwaite, N. (eds.). Schooling in the Pacific Islands: Colonies in Transition, Oxford, Pergamon.
4. Papua New Guinea, Department of Education (1981), Educational Annual Report, 1981. Port Moresby, Government Printer, p.27.

## PHILIPPINES

Marcelina M. Miguel

### National Development Goals

The national development goals, the realization of which is supposed to be the major objective/goal of all ministries in the government including education, are stated below:

1. To achieve and maintain an accelerating rate of economic development and social progress;
2. To assure the maximum participation of all the people in the attainment and enjoyment of the benefits of such growth; and
3. To strengthen national consciousness and promote desirable cultural values in a changing world.

### National Educational Aims

Given the stated development goals, the educational system, as a major contributor to their attainment should:

- a. Provide for a broad general education that will assist each individual, in the peculiar ecology of his society to (1) attain his potential as a human being; (2) enhance the range and quality of individual and group participation in the basic functions of society, and (3) to acquire the essential educational foundation for his development into a production and versatile citizen.
- b. Train the nation's manpower in the middle-level skills required for the nation, advance knowledge for improving the quality of life.
- c. Respond effectively to changing needs and conditions of the nation through a system of educational planning and evaluation.

As stated in the PCSPE Report, the aim of elementary education is "to provide the knowledge, skills and attitudes which are basic for personal development and modern living in an expanding society... Basic education should provide literacy and develop in the individual cognitive power, numerical manipulation and communication skills. In the absence of indices of the last 3 aspects of general education, literacy is used here as a crude indicator of the degree of learning in the elementary grades."

## Sources of Curriculum Content

Shortly after Proclamation No. 1081 which declared Martial Law on September 21, 1972 took effect, Presidential Decree No. 6-A, otherwise known as the Educational Development Decree of 1972, was promulgated. To implement PD 6-A, the Department of Education (presently known as the Ministry of Education, Culture and Sports, MECS for short) issued a department order, viz., Department Order No. 6, s. 1973, which embodies a programme of reform intended to make education contribute more substantially to the immediate national effort at reforming society and at meeting current urgencies of the country.

The programme of educational reform called for curricular redirection, a revision in teaching methodology and techniques, as well as reforms in administrative services and resource management. Certain aspects of the content of the curriculum was dictated by the need to build a new New Society immediately when Martial Law came into effect. In the attainment of the goals of the New Society, the Administration or Government pledged to do the following represented by the acronym, PLEDGES-

- P - Maintain peace and order
- L - Implement land reform
- E - Institute Economic Development
- D - Develop moral and spiritual values
- G - Reorganize the government
- E - Effect educational reforms
- S - Undertake social services

Concepts concerning PLEDGES were integrated into the existing elementary curriculum which was introduced in 1970 to replace the 1957 curriculum.

Another major source of new curriculum content was the 1973 Constitution which provides for: (1) strengthening of the family as a basic institution, (2) the stress on scientific, technological and vocational efficiency, (3) preserving and developing Filipino culture and (4) population education. More specifically, the content needed to implement the objectives and goals of the New Society were considered to make education more relevant to national development goals. These are: (1) population education; (2) nutrition education; (3) food production; (4) wise conservation and utilization of natural resources; (5) taxation education; (6) cooperatives education; (7) land and water utilization; (8) agrarian reform; (9) consumer's education; (10) environmental education programme; (11) buy-Filipino movement; (12) green revolution; (13) values of Filipinism and nationalism; (14) DEC-RAD Programme (Department of Education and Culture Reconstruction and Development Programme for Muslim Mindanao); (15) The Educational Travel and Tourism Programme; (16) Alay Tanim; (17) Youth Civic Action Programme and (18) Non-formal Education for adults and out-of-school youth.

An immediate response to this call for curricular redirection was

the country-wide adoption of a work-oriented curriculum issued as Department Order No. 1, s. 1972. Work-orientation as differentiated from work education which is a subject requirement, is the development of desirable work habits, attitudes and skills.

It must be mentioned at this point that the Revised Elementary Education Programme launched in 1970 to replace the 1957 elementary curriculum was the same curriculum that was implemented as a work-oriented one. Work-orientation was implemented through different approaches, viz., Enrichment, Theory and Practice Scheme and Core Curriculum Organization.

#### Survey of the Outcomes of Elementary Education (SOUTELE) (1975-1976)

Project SOUTELE is the Philippines' attempt at a self-critical analysis of the performance of the system at the lowest level of education. It has provided massive empirical evidence which provides cues for the direction of change not only at the elementary education level but at the teacher education level as well. SOUTELE provided the rational basis for reform in the elementary education system and its findings and recommendation as well as its spin-off such as the development of the new elementary school curriculum and the learning continuum. Some of the major findings that directly affected curriculum development are listed below.

1. The teachers lack proper understanding of change and innovations in education. As a result, a moratorium was declared on many of these innovations.

2. The subject areas which the sixth graders across the nation seem to have learned least are those which have been traditionally referred to as the three R's - Reading, mathematics and language.

3. Children who enroll in elementary schools start with varying socio-cultural levels because of vast differences in economic status. A large portion of them are disadvantaged and this would need different curricula of the remedial and compensatory types.

4. Instructional materials used by teachers are at most "barely adequate" and often times bought by the teachers themselves.

5. The curriculum is congested. The learning of communication skills in either English or Pilipino was hindered by the introduction of so many concepts regarding other government agency concerns like taxation education, agrarian reform, etc., to the extent that learning of the basic learning-to-learn skills was not given due emphasis.

All the findings of SOUTELE regarding pupil-achievement levels, the teacher's perceptions of educational innovations and the availability of instructional materials virtually served as the cues for the direction of reform in elementary education. Basically, it pointed to

a simplified or decongested curriculum which allows for mastery learning and for decentralization and flexibility of curricular programmes.

The Experimental Elementary Education Programme (EEEP). This programme was carried out by the Bureau of Elementary Education for 2 years (1978-1980) in response to the recommendation in the SOUTELE report for the decongestion of the elementary education curriculum and for its modification so it will be development-oriented, relevant to present day needs and flexible to rescheduling.

Consequently, the EEEP served as an intermediate stage from the 1970 curriculum to the New Elementary School Curriculum launched in 1983 in the sense that it offered fewer subjects in Grades I-II to give more time for the learners to master the basic competencies or learning skills, specifically the 3 R's. Changes in the curriculum included the integration of language and reading in the subject, Communication Arts. In Grades I and II, the competencies or skills in Communication Arts (English) were developed in learning situations drawn largely from Science and Health content, while in Communication Arts (Pilipino), these were learned in the context of Social Studies concepts. Another change in the programme is the introduction of Work Education beginning in Grade I.

After two years of experimentation in one school in each of the 125 divisions throughout the country, the test results showed that the pupils taught in the EEEP curriculum got higher scores in Reading and Language (English & Pilipino) and Mathematics compared to those in the control group who were taught in the 1970 curriculum. This experimental programme was the critical pilot field trial of the new curriculum that is being gradually implemented starting this school year, 1983-1984. It has pointed out the possibility that a decongested curriculum can equally be as good if not better in delivering basic education in the lowest level of the education system than the 1970 curriculum.

PROCEED: The Ten-Year Development Programme for Elementary Education

In keeping with the requirement of the Planning Service of the Education Ministry for submission of performance plans, the Bureau of Elementary Education (BEE) prepared its 10-year Programme for Comprehensive Elementary Education Development (PROCEED) for this decade, 1981-1990. PROCEED has nine components: mission and values, curriculum development, teacher-development and welfare, facilities development, instructional materials development, management, financing and school-based health education and pre-elementary education. PROCEED will be the focal point for the planning and implementation of educational subprojects that will meet both the national and regional needs through a tri-dimensional approach which is country-specific, region-based and learning area-related.

Programme for Decentralized Educational Development (PRODED)  
This programme is a four-year (1982-1985) investment programme of the

Ministry of Education, Culture and Sports through the Bureau of Elementary Education, which is financially supported by the \$100-M. World Bank Loan. It is a part of PROCEED, the 10-year (1981-1990) development programme of the Bureau of Elementary Education addressed to:

1. Raising the over-all quality and efficiency of elementary education
2. Improving the management capabilities of the education system, especially at the regional and sub-regional levels
3. Reducing disparities among and within regions in service delivery and resource allocation.

PRODED has five components with many projects being carried about: (1) facilities development; (2) Instructional materials development; (3) Staff development; (4) Technical Assistance and Special Studies.

The New Elementary School Curriculum (NESC). Curriculum Development in PRODED is one of the projects under Special Studies component, which among other purposes seeks to provide empirical bases for instructional improvement and development of educational policies. The NESC orients elementary education to national development requirements, reflecting research-based directions (PCSPE, SOUTELE, EEEP) for curricular change. Addressed to civic, intellectual and character development, NESC covers the general education of the child-as a person, as a citizen, and as a productive agent. Its thrust in intellectual growth towards the enhancement of human/civic/cultural development.

Features:

- a. Fewer learning areas, with emphasis on mastery learning
- b. Longer time allotment for basic skills development - reading, writing, and mathematics
- c. Greater emphasis on intellectual skills development
- d. Focus on the development of humanism and sense of nationhood in all learning areas
- e. Health values infused into whole curriculum
- f. Systematic development of competencies and values for social living



## Implementation Schedule

Grade	Pilot Testing	Implementation
I	SY 1982-1983	June, 1983
II	SY 1983-1984	June, 1984
III	SY 1984-1985	June, 1985
IV	SY 1985-1986	June, 1986
V	SY 1986-1987	June, 1987
VI	SY 1987-1988	June, 1988

### Implementation of the New Curriculum

Experience in the past pointed out that failures in innovations and other development activities were due to inadequate preparation for implementation. With the changes in the new curriculum and with far-reaching national objectives in view, the necessary preparatory measures that would insure high feasibility in effective implementation have to be taken. Among these measures are careful development of pedagogically valid learning/teaching materials and evaluation instruments; critical pilot field trial of these and revision in terms of learner achievement and other feedback; suitable enhancement of the competencies of teachers and other education personnel; and parent/community orientation in support of the changes. Thus, the timing of the national implementation has to be such that adequate actions would have been completed prior to the wide-scale introduction of the new curriculum.

A. The Revised Elementary Education Curriculum  
(Effective School Year 1970-71)

SUBJECT AREAS	Time Allotment - Minutes Per Day				
	Time Allotment (Minutes Daily)				
	I	II	III	IV	V-VI
Character Education	20	20	20	20	20
Language Arts	140*	140	120	120	120
Vernacular	(40)	(40)	-	-	-
Pilipino	(60)	(60)	(60)	(60)	(40)
English	(40)	(40)	(60)	(60)	80
Social Studies	30	30	30	40	40
Elementary Mathematics	30	30	30	30	40
Health and Science	30	30	30	30	40
Music and Arts	30	30	30	30	30
Work Education	-	-	40	60	80
Physical Education	20	20	20	30	40
Total Minutes Daily	300	300	320	360	410

\* Suggested time allotment (Figures in Parenthesis)

B. The New Elementary School Curriculum  
(Effective School Year 1983-84)

	Time Allotment - Minutes Per Day					
	Daily Time Allotment					
	I	II	III	IV	V	VI
Character Building	20-30	20-30	20	20	20	20
Activities	60	60	60	60	60	60
Pilipino	60	60	60	60	60	60
English	40	40	40	40	40	40
Mathematics	40	40	40	40	40	40
Civics and Culture			40	-	-	-
(Hist./Geog./Work						
Ethic)						
History/Geography/			-	40	40	40
Civics			40	40	40	40
Science and Health			40	40	40	40
Arts and Physical						
Education						
Home Economics and				40	60	60
Livelihood Education						
Total Minutes Daily	220-230	220-230	300	340	360	360

# REPUBLIC OF KOREA

Kwak Byong-sun,  
Im Dae Yung  
&  
Ryu Han Koo

## A. Definition

1. Curriculum in this paper is defined as a plan of any level from national level to classroom setting which can be effected in school education directly for educational consequence on students through the reconstruction of cultural elements such as knowledge, modes of thought, and experiences. A curriculum can be expressed in many ways such as official documents, textbooks and teachers' manuals, self-sufficient teaching/learning programmes, teachers' overt or hidden plan of instruction, etc.

## B. Context

2. Elementary school covers the 6 year span, ages from 6 to 11 as compulsory. As of 1982, a total of 5,465,000 pupils are enrolled at 6,501 schools, and 124,572 teachers are employed. Over 98% of pupils enter middle school after their graduation.

3. The aim of elementary education is to provide basic ability for further learning and daily life. School curriculum mainly consists of subject matter and extra-curricula activities. The subject matter includes nine areas: moral education, Korean Language, social studies, mathematics, science, physical education, music, visual arts, and practical arts. The total number of school weeks a year is 34.

4. Responsibility for the development of curriculum belongs to the Minister of Education. Most curriculum decisions from educational objectives to the content of textbooks are to be made by the central authority.

5. Four major curriculum changes have been made since the first curriculum established in 1954. Second revision took place in 1962, third in 1973, and the last change in 1981. All the curriculum changes were initiated by MOE.

## C. Trends in 1970s

6. The curriculum maintained throughout 1960s was characterized by life adjustment centered curriculum. That curriculum began to be criticized for its emphasis on rote learning of segmented knowledge from the perspectives of intellectual drive which had been widely prevalent since the late of 1960s. In the meantime the National Education Charter which declares the very importance of intellectual, moral, and

spiritual development in the nation building was promulgated in 1968 as a fundamental guidelines for nations' education. By the way, a new political structure emerged in 1972 demanded that school curriculum be more relevant to changed socio-political structure.

7. The Ministry of Education revised the school curriculum in 1973 in order to meet new trends in curriculum theory emphasizing on structured knowledge, the spirit of the National Education Charter, and the need of changing society. The basic thrust of curriculum revision highlighted the three areas of concern: 1) cultivation of the quality of sound citizen, 2) development of humane characteristics, and 3) innovation of general and technical education.

8. For the first time, the MOE adopted field-trial process in the development of textbooks and teachers guides during the 1973 curriculum revision. The MOE designated experimental schools around the country to examine the validity and feasibility of draft texts and guides.

9. One striking departure of the changed curriculum from the old one was that the moral education was newly included as a separate subject matter. Before the 1973 the moral education was dealt with as a common requirement by all subject matters together. Since 1973, moral education as a field of study has become of great concern among teachers and education researchers.

10. One of the most important characteristics of 1973 revision was a rigorous introduction of disciplinary approach in content selection and teaching method. It was suggested that the curriculum of a subject should be determined by the most fundamental understanding that can be achieved of the underlying principles that give structure to a discipline.

11. Following the 1973 curriculum change, a massive longterm project to reform elementary and middle school education (The E-M Project) has been conducted by Korean Educational Development Institute (KEDI). The E-M project was among the most comprehensive efforts at educational innovation ever undertaken. It involved a systematic effort to develop: educational goals, a new and improved curriculum, appropriate and effective learning materials including radio and television, a new instructional system, a new school management system, an evaluation plan, and a system of field trials designed to assess the effectiveness of the entire project. The E-M project has been implemented with a remarkable achievement at nationwide scale. The E-M project provided a firm foundation for establishing educational radio and television system in the country. The E-M project plays a fundamental role in the continuing endeavor to improve school curriculum in the 1980s.

#### D. New Change Toward 1980s

12. Over 10 years' experience of the E-M project and many curricu-

lum studies mainly conducted by KEDI reveal a new need for curriculum change at the threshold of 1980s. Some major reasons for curriculum change were: 1) heavy work load for pupils due to over emphasis on discipline centered approach, 2) irrelevant content to pupils' authentic experience, 3) too many divided subject matter at an early school years, and 4) a new social need for changed socio-political structure.

13. In 1980, the Ministry of Education commissioned KEDI to prepare a new school curriculum. KEDI submitted a proposal for new curriculum in 1981. The MOE reviewed the KEDI's proposal and promulgated it to be effected from 1982.

14. The new curriculum redefined the educational goals in order to be more relevant to the needs of pupils and changing society, and new conception of knowledge. Development of whole person with a sense of national identity and basic ability for self-actualization was the underlying guidelines of new curriculum.

15. One of drastic change in new curriculum is the integration of subject areas for grade 1 and 2. Nine subject areas are integrated into three broad areas.

16. The education of foreign language (English) is allowed as one of extra-curricula activities beginning grade 4. The foreign language instruction at elementary school is supported by the increasing demand for international exchange.

17. An effort to improve teaching and evaluation method in order to maximize the new curriculum implementation takes place around the country by the leading role of MOE and KEDI. KEDI's instructional systems model, concept teaching model, creative thinking model, inquiry teaching model, group inquiry teaching model, qualitative evaluation, etc. are identified as prime focus in current discussions among teachers and educational administrators.

Tan Teng Wah  
&  
Han Ah Yew

## I. Introduction

Singapore has been a multi-lingual and multi-racial society from its early days in the nineteenth century. Since then the education systems were designed to meet the needs and demands of the fast growing nation. By 1970 every six-year-old was assured of a place in an elementary school to receive education in the language media of his parents' choice: English, Chinese, Malay or Tamil. The majority chose English.

In the same year the Central Advisory Committee on Curriculum Development (ACCD) was established to undertake curriculum development on a more thorough and systematic basis so that national and educational goals were attained more speedily. The Committee was to follow a continuous cycle of implementation, evaluation and improvement instead of the 'scissors-and-paste' approach prior to 1970. The main emphasis in education in the 70s was to improve the quality of teachers, teaching methods and teaching curriculum. The revamping of teacher training in the newly established Institute of Education (IE) in 1970 and the setting up of the Curriculum Development Institute of Singapore (CDIS) in 1980 to develop better and more suitable instructional materials reflected the seriousness of Singapore's intent to bring about quality in the education system.

## II. Objectives of the Elementary Curriculum

The objectives guiding curriculum development in Singapore remained, as a general rule, unchanged since our independence in 1959. They are:

1. to attain literacy in at least one language (L1)
2. to promote bilingualism, that is, to be proficient in one language and have at least the minimum level of literacy(i) in a second language (L2)
3. to minimise education wastage which results from the failure to achieve expected standards, premature school-leaving and repetition of grades
4. to produce manpower with the requisite skills for the economy
5. to inculcate in pupils desired moral values, for example, loyalty, patriotism, love of family and neighbours, tolerance

and good manners.

### III. Changes in the Elementary Curriculum in the Last Decade

Prior to 1970, more time was allotted to school subjects and extra subjects were added to the curriculum. The ACCD set up in 1970 attended immediately to the study and review of the existing elementary curriculum in an attempt to lighten the load of our pupils. It was agreed that all the subjects were necessary for the proper and balanced development of our pupils, but the practice of treating the subjects as separate entities with each its specified allocated time hindered the effective integration of closely related subjects.

So, subjects were grouped with specified time blocks. These groupings could be modified at various levels, depending on the specific objectives at each stage. Thus at primary five and six levels, some subjects would have to revert to disciplines in their own right in anticipation of demands at the secondary school. (Please see Annex 1 for details of subject groupings).

At the initial stages of implementation of this curriculum change, syllabuses were reviewed to identify essential principles and concepts, to discard unnecessary content and to avoid any overlap. By late 1971, seven primary schools were experimenting with the teaching of an integrated curriculum of mathematics, science, and English language. Forty-three other schools also tried to teach the curriculum. However, language policy changes in 1972 affected further expansion of the pilot project.

In 1973 instruction of the first and second languages (ii) was strengthened with an increase from 18% to 40% curriculum time for L2 and awarding equal weightage to both languages. Schools could decide on the subjects to be taught in the second language. Eventually, science and mathematics were taught in English, and civics and social studies, in the second language.

In early 1979, a study team headed by Dr Goh Keng Swee, the first Deputy Prime Minister, examined the problems in the Ministry of Education. Among the findings, the language issue generated the greatest repercussion on curriculum development. Although most schools give instruction in two languages (English and L2) 85% of the pupils do not speak either of the languages at home and more than 60% of those who sat for the Primary School Leaving Examination (PSLE) failed in one or both languages.

The Team recommended a New Education System which was implemented in stages starting in 1979. It recommended the emphasis on language learning and mathematics referred to as the core subjects in the elementary curriculum for the first three years. Then the pupils are streamed, in terms of ability to minimise education wastage, into the

Normal, Extended or Monolingual Courses according to their achievement in the core subjects. In 1983 additional tests which included intelligence tests were administered to Primary Three pupils for the Gifted Programme.

Pupils in the Normal Course will study two languages and complete their elementary education in six years, while those in the Extended Course, in eight years. These two groups will sit for the PSLE at the end of their respective courses. The Monolingual Course pupils follow a curriculum which concentrates on one language and basic numeracy. This group will sit for a simple examination to qualify for a certificate that will enable them to proceed for training in a skill of trade at the Vocational and Industrial Training Board. (Details are at Annexes 2).

#### IV. The Current Elementary Curriculum

1984 marks the beginning of the national-stream schools in Singapore where the medium of instruction in all schools is English and the mother-tongue (iii) is taught as L2. While English is the language of commerce, science and technology, the mother-tongue serves as the transmitter of our cultural values and tradition.

All subjects except L2 and civics/moral education are taught in English. From Primary Four onwards the medium of instruction proposed for Art & Craft and Music is in the mother-tongue.

#### V. Role of the Curriculum Branch and CDIS

The Curriculum Branch of the Ministry of Education is responsible for the review and development of the school curricula and syllabuses. In addition it assists in the implementation of innovations and effective teaching in schools. The CDIS, on the other hand, caters to the teachers' reliance on textbooks and provides schools not only with improved instructional materials which include audio-visual teaching aids and teacher's guides.

- (i) Languages - The materials for the four languages are at various stages of development. By 1984 only the Chinese language (CLIPS) (iv) packages cater for all grade levels in elementary schools. The English language packages (there are two of them) for Primary 6 Normal and Primary 8 Extended courses will be completed in 1985. Materials for Primary 1 and 2 for Tamil and Malay as L2 are available for use in schools this year.
- (ii) Mathematics - The syllabus last revised in 1980, reduced the depth and content of certain topics, and enables children to learn mathematics through understanding. Materials up to Primary 5 Normal and Primary 7 Extended Courses are being used in 1984.



- (iii) Science - Formal science is taught through language in Primary 1 and 2. The primary science syllabus, revised in 1971 and 1978, aims at teaching basic science concepts, scientific skills and attitudes and at cutting down on rote learning. The materials for up to Primary 5 Normal, Primary 6 Normal and Extended Courses are available now.
- (iv) Social Studies - Social Studies combined history and geography. Approved in 1981, it is tailored for pupils from Primary 4 upwards. The emphasis is on local history and geography. Primary 4 materials are being used in schools in 1984.
- (v) Moral Education - With the replacement of civics by moral education, two programmes have been developed for the moral education syllabus. These are the 'Good Citizens' series and the 'Being and Becoming' project. They are fully implemented in schools this year.

## VI. Conclusion

The important lesson to be learnt from the Singapore experience is that successful curriculum development comes with concerted efforts involving a good mix of administrators, curriculum developers, subject specialist writers, teachers, educators, curriculum evaluators and teachers at every stage of planning, preparation and implementation and backed by generous funds provided by the government.

### Footnotes:

- (i) The minimum level of literacy is defined as the ability to read the local news and sports news in the newspapers and to write simple letters.
- (ii) The first language in Singapore does not mean the first language of the learner in order of acquisition nor the first language in terms of the learner's degree of proficiency. It denotes the language used in the school system as the medium of instruction for most of the subjects in the curriculum, while the second language is the other language he is taught.
- (iii) The mother tongues of Singaporeans are Chinese, Malay and Tamil. These are also the official languages of the nation.
- (iv) Acronym for Chinese Languages Instructional Materials for Primary Schools.

## GROUPING OF SUBJECTS IN THE ELEMENTARY CURRICULUM

Primary I & II	Primary III & IV	Primary V & VI
1 Language Arts 1st Language 2nd " Library Skills	1 Language Arts 1st Language 2nd " 3rd " Library Skills	Language Arts
		1 1st Language
		2 2nd "
		3 3rd "
2 Environmental Studies History Geography Science Mathematics	2 Social Studies History & Geogrpby	4 Social Studies
	3 Environ Studies Science	5 Science
	4 Mathematics	6 Mathematics
3 Studies in Aes- thetic App Art/Craft Music Mod Edun Dance Phy Edun	5 Studies in Aesthetic App Art/Craft Music Mod Edun Dance Phy Edun	7 Art/Craft
		8 Aesthetic Edun Music Mod Edun Dance Phy Edun
4 Social Edun Moral Edun Health Edun Assembly	6 Social Edun Moral Edun Health Edun Assembly	9 Social Edun Moral Edun Health Edun Assembly, Civics

TABLE 1: Primary Curriculum: Normal and Extended Courses

Subjects	No. of Hours spent per week*			
	Pr 1 and 2	Pr 3	P4N/P4E and P5E	P5N-P6N/ P6E-P8E
First Language	7 1/2	7	6 1/2	6 1/2
Second Language	5	4	4	4
Civics and Moral Education	1 1/2	3	2	2
Social Studies	-	-	1	1 1/2
Science	-	1 3/4	2 1/4	2 1/4
Mathematics	3	3 1/2	3 1/2	4 1/4
Art Handwork and Needlework	2	1 1/2	1	1
Music	1	1	1	1 7/12
Physical Education	1 1/2	1	1	1
Health Education	1/2	1/2	1/2	1/2
Assembly	1/2	1/2	1/2	1/2
Total (per week):	22 1/2	23 3/4	23 1/4	24 7/12

\* Minor adjustments may be made by schools.

TABLE 2: Primary Curriculum: Monolingual Course

Subjects	No. of Hours spent per week*		
	P4M and P5M	P6M-P7M	P8M
Language	10	10	8 1/2
Arithmetic	3	3	3
Handwork	2	3	5
Civic Training/Moral Education	2	2 7/12	2 1/2
Physical Education	1 1/4	1	1
Music	1	1/2	1/2
Health Education	1/2	1/2	1/2
Assembly	1/2	1/2	1/2
Spoken 2nd Language	3 1/2	3 1/2	3 1/2
Total (per week):	23 3/4	24 7/12	25

\* Minor amendments may be made by schools.

Nearly four decades have passed since Sri Lanka received her independence. Even before she became independent the Kannangara reforms endowed her with a system of free education. The educational system today is the outcome of a multitude of educational reforms implemented during the last four decades.

Expansion of education in rural areas and the establishment of central schools in Sri Lanka undoubtedly resulted in higher educational aspirations. Eventually the 1960ies saw an influx of educated youth who aspired for higher jobs. The economic pattern of the country could no longer provide jobs to the increasing educated youth and the educational system no longer suited the needs of the country. The educational system gave rise to an inculcation of false values and attitudes which were by no means in accordance with the economic and cultural background of the country.

Since Independence successive governments which came into power attempted changes in the educational system to suit the requirements of the country. The 1972 educational reforms produced an activity based curriculum for the primary education which was derived from the following fundamentals -

- i. Children learn willingly and responsively when they are offered meaningful experiences in a natural setting, making abundant use of the environment familiar to them. Consequently the compartmentalized subject curriculum at the primary level should give way to a set of integrated activities which children may pursue freely according to their interests and inclinations.
- ii. Children pass through pre-operational and concrete operational states during the period when they are in the primary school. They will thereafter learn actively through all their senses. This implies that the present roles of teachers as doers and of children as receivers should change. Challenging activity-based tasks providing guided discovery learning to catch the imagination and attention of young children are necessary.
- iii. Children should be given opportunities for group work so that they may learn through practical experiences to gradually change their natural ego-centric and competitive behaviour patterns to those of tolerance and co-operation.
- iv. To foster moral development, children should be enforced to practical situations to foster in them attitudes and a

value system which will help them to be impartial and considerate to others.

- v. In addition to planned physical exercise geared to healthy physical growth, free-movement role playing, improvised music, drama and devices for thought stimulation should be used for nurturing and developing creativity in children.
- vi. Development of mathematical concepts in early years should be realised through activities related to the stages of development through which children pass in prepared sequential order.
- vii. Subjecting children to periodic onslaughts of testing should be replaced by a process of continuous assessment of their work by teachers for purposes of planning future experiences for them. Each child should be encouraged not to out do others but to better his own previous record.

Accordingly, primary education included Grades 1-5. The admission age was raised from 5 yrs to 6 yrs.

The primary school curriculum included the following seven subjects according to the 1972 Educational Reforms -

1. Religion
2. Mother tongue
3. Second Language
4. Mathematics
5. Physical and Aesthetic activity
6. Creative activity
7. Environmental studies

The main purpose in including Religion as the first subject into the curriculum was to prepare loyal and law-abiding balanced citizens. It was meant to bring about character formation.

The reforms provided the option to a Tamil child to choose English or Sinhala as his second language. A Sinhala child could select English or Tamil, but it is revealed that everybody choose English as his or her second language.

The reforms suggested that the English Language should be taught from Grade Three upwards, but it also said that it could be taught from Grade Six upwards until such time the schools could find the qualified teachers for the lower three grades.

Physical and Aesthetic education included, Games, Health, Eurythmics, Singing, Instrumental Music and Creative activity. Creative activ-

ity was broad-based. It included Art, Handicrafts and Pottery for boys and Needlework for girls. Environmental studies was also a wide subject. It covered the subject areas of social studies, History and Geography.

Most of the developing countries experience educational wastage to a large extent. The 1972 Educational Reforms had made an attempt to minimise educational wastage by several ways. Accordingly a child should complete at least his first cycle of education, namely, his primary education. Failing to do so amounts to educational wastage. A child who is made to repeat in his grade is likely to be a drop-out. The adoption of the system of automatic promotions minimises incidents of drop-outs. It is assumed that children are brought to a certain standard before promoting them to a higher grade. However, when a child who reaches grade five is below the required standard the child could be made to repeat an additional year in the same grade.

All the primary school subjects envisage an integrated approach. As far as the subjects and school time table was concerned there was no strict compartmentalization. There was definitely a free atmosphere which provided ample opportunities for the development of creative talents. The teacher centred educational pattern was replaced by the pupil centred system.

Although the 1972 Educational Reform was rich in their scope and content the schools could not cope up with their hasty implementation.

Primary education need not necessarily be a system of education which prepares a child for secondary education but .." it should make first level education broad and meaningful enough to provide for many pupils who will go out into the world or work". The large percentage of students who leave school after their compulsory school age as well as the students who proceed for their higher studies need a sound primary education it has to be one which is beneficial for both sections.

Psychologists feel that the primary school curriculum should be one which helps a child's personality development. Sri Lanka being a developing country needs a primary education which should definitely envisage programmes which help in the development of suitable attitudes much needed for the development of the country.

Science and technology seems to make drastic changes in the country. This challenge has to be faced by not mere teaching but by providing guidance for learning. A number of remedial measures have been suggested by the white paper in education of 1978 in order to eliminate some of the defects in the primary system of education -

1. There is a grave discrepancy in the distribution of resources among the schools which exceed 9500. An attempt should be made to have an equal distribution of resources or a sharing of resources.

2. Today instead of imparting a balanced education to students, schools have turned out to be institutions which foster competition among students.
3. Subject material which is not included for written tests is not considered important.

Having grasped the above mentioned defects the government which came into power in 1977 suggested in 1978 that the age of admission to schools should be 5+. The Kindergarten class was brought back to schools. The upper level of the junior, secondary which was Grade Nine was raised to Grade 10. Thereby the period of junior-secondary education was extended by two years.

In addition to the above implementations a number of other ideas are being implemented as regards primary education -

1. Primary education is limited to a specific period of 5 years (from Grade 1 to Grade 5)
2. Today the primary school adheres to the integrated approach in all grades from 1-5. Instead of this method it is limited to Grades 1-3 and Grades 4-5 follow a partly integrated approach.
3. The practice of coaching a child for the Grade 5 Scholarship examination is being given priority in Schools. Thereby the emphasis on the more important pattern of behavioural education is being submerged. An abolition of the Grade Five Scholarship Examination and the introduction of a similar test in Grade Eight will no doubt give a student greater educational opportunities.
4. There is no repetition of grades other than in grade 5 as earlier.
5. The introduction of Science and Physical Education as two separate subjects, from grade 3.
6. Make the English Language a compulsory second language from Grade Three. This is a much needed measure to foster international friendship.
7. To minimise the class population to 35 students.

As the white paper in education of 1978 prepared primary education (5 yrs to 10 yrs) should enable a child to gain a maximum development of his or her creative abilities, the child should acquire a variety of rich and noble experiences. He or she who steps into school from his or her home should study a curriculum which is rich in reality. The child should not feel that it is something alien to his or her

environment.

The primary school curriculum should be one which enables a child to develop his or her curiosity at the same time reading, writing and number are subject areas which should be given priority in the curriculum. In order to make these educational proposals a success the tasks of teaching and evaluation of students should be carried out effectively.

Thus it is clear that a number of valuable educational reforms proposed by the White Paper are being carried out in the sphere of primary education from 1984.



## THAILAND

Kamol Sudaprasert  
&  
Siriporn Boonyananta

### I. Introduction

Educational system in Thailand in the past decade has gone through a period of remarkable change. There were many factors leading to such change. Political, social and economic circumstances which had rapidly and, to a certain extent, unfavorably changed were among the major evidences. Students' uprising which took place in 1973 has also

"considerably provoked Thai scholars, especially sociologists, economists and educators, to reconsider and review the role, function and status of the educational system".<sup>1</sup>

As a result to the above antecedents- an educational reform policy was promulgated in 1974. To be in line with the policy, the new National Education Scheme was formulated emphasising equal rights to education and self-development of all Thai citizens with education being viewed as a means to well-being and happiness of all in the society. This new National Education Scheme has been officially implemented since 1977.

According to the National Education Scheme, structure of the school system has been changed from the previous 4-3-3-2 (four years of lower elementary education, three years of upper elementary education, three years of lower secondary education and two years of upper secondary education) into a present 6-3-3 system (six years of compulsory elementary education or grades 1-6, three years of lower secondary education or grades 7-9 and three years of upper secondary education or grades 10-12). The new system, launched in May 1978 with one grade in both elementary and secondary levels at the start, will complete its first cycle in May 1984.

### II. The Elementary School Curriculum: It's Major Trends

The present elementary school curriculum has been modified in accordance with the National Education Scheme and the new structure of the school system. The major trends of the curriculum which was drafted in 1975, tried-out in 1976, and implemented in 1978, are as

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1 Kamol Sudaprasert, The School Cluster System in Thailand: An Evaluations of Selected Aspects of An Educational Innovation, Unpublished dissertation, Florida State University, 1983, p.9.

follows:

## 1. Curriculum for Life and Society

As the previous 1960 elementary school curriculum emphasized more on academic skills which made it more beneficial for minority of the students who would pursue their studies in the upper levels, the present curriculum emphasizes life and society as it is meant for all children, occupation-bound as well as secondary-school-bound. The curriculum thus aims at cultivating the following qualities and outcomes;

### 1.1 Basic Knowledge and Skills

- 1.1.1 Personal and community health both physical and mental.
- 1.1.2 Legal knowledge necessary for everyday living.
- 1.1.3 Knowledge and skills in earning, consuming and saving.
- 1.1.4 Understanding of scientific and technological implication in daily life.
- 1.1.5 Knowledge and skills in management, and in working together under the principles of cooperatives.
- 1.1.6 Knowledge and skills in working both as a producer and as a consumer.
- 1.1.7 Habit in pursuing further knowledge.
- 1.1.8 Knowledge and skills in language and mathematics.
- 1.1.9 Knowledge and skills in the use of the scientific method.
- 1.1.10 Ability to survive and live in harmony with social and natural environment.
- 1.1.11 Appreciation and expression of various forms of arts.

### 1.2 Good Member of Community and Nation

- 1.2.1 Faith in a constitutional monarchical democracy.
- 1.2.2 Appreciation and preservation of national arts and culture.
- 1.2.3 Awareness of one's rights and responsibilities.
- 1.2.4 Recognition of the importance of living together peacefully in a family, in a community, and in a society.
- 1.2.5 Recognition of international relations on the regional and world levels, as well as international understanding.

- 1.2.6 Ability in mobilizing intellectual, physical, and economic resources for national development and security.
- 1.2.7 Awareness of the value of being free, and taking pride in having been born on Thai soil.

### 1.3 Desirable Qualities

- 1.3.1 Self-sacrifice and unselfishness.
- 1.3.2 Self-discipline and perseverance.
- 1.3.3 Diligence, honesty, frugality and endurance.
- 1.3.4 Critical thinking and rational decision making.
- 1.3.5 Tolerance of criticism and respect for individuals.
- 1.3.6 Sportsmanship and esteem for others.
- 1.3.7 Participation, cooperation and leadership.

### 1.4 Peaceful Life

- 1.4.1 Knowing how to adjust oneself to the changing society, environment, innovation and technology.
- 1.4.2 Understanding and having faith in one's professed religion, and applying its precepts in daily life.
- 1.4.3 Knowing how to spend time wisely and effectively.
- 1.4.4 Initiation and creativity for personal social benefits.
- 1.4.5 Having independent thinking as well as being open-minded.
- 1.4.6 Knowing how to solve problems by peaceful means.

## 2. Integration of the Subject Matters Organization

The structure of the present elementary school curriculum has been changed from the subject-wise approach of the previous curriculum into the integration approach. This new approach of subject-matter organization, presumed to be more in line with young children's nature of learning, consists of five areas of learning experiences:

Area 1: Basic Skills Development, comprising the Thai language and Mathematics.

Area 2: Life Experiences, involving the problem-solving process, and the various aspects of human societal needs and problems, for the purposes of survival and leading a good life.

Area 3: Character Development, dealing with experiences conducive

to development and habit formation.

Area 4: Work-Oriented Education, involving practical work and establishment of a vocational foundation.

Area 5: Special Experience, comprising "English for Everyday Life" and "Basic Vocational Courses" as electives for grades 5 and 6.

### 3. Conceptual-oriented and Behavioral-oriented Approaches to Content Presentation

The present elementary school curriculum uses the conceptual-oriented and behavioral-oriented approaches to content presentation instead of the former content-oriented approach of the 1960 elementary school curriculum. With these new approaches, the contents are presented in forms of concepts and behavioral objections which has proved to be more meaningful to both the learners and the teachers than bits and pieces of mere facts presented under the former approach.

### 4. Student-centred Teaching and Learning Activities

The 1978 elementary school curriculum is obviously more student-centred than the 1960 version. It emphasizes the differences among individual students as well as conditions of the community where the students live. In this regard, teaching and learning activities in the curriculum are organized through the following strategies:

- 4.1 Organization of content and learning activities for each lesson should be made flexible in accordance with the condition of the community, and the interest of the learner. Attempts should be made to relate as much as possible experiences from the various learning areas.
- 4.2 Teaching methods should be such as to encourage the learner to be aware of local problems and needs, to stimulate critical thinking and problem-solving ability and to apply learning in daily life, taking into consideration particular method that may help achieve the curriculum objectives, as for instance, problem-solving method, inquiry method, group work, etc.
- 4.3 The learner should be given an opportunity to engage in both the theoretical and practical aspects of the learning activities, so as to encourage individual growth and a successful life in the society.
- 4.4 Each period of learning is of 20 minutes duration. Schools and communities can adjust their own scheduling to suit the age-level of the learner, content and activities.

- 4.5 Measurement, evaluation and follow-up processes, organized to develop appropriate teaching and learning activities, and for student to achieve mid-year or end-of-year promotion, are the responsibilities of school administrators and classroom teachers, who carry out formative and/or summative evaluations according to the kinds of experiences and subject contents involved. These, in effect, are to be done in conformity with the evaluation regulations as prescribed by the Ministry of Education.

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